THOMSON 28DG22C

MODEL

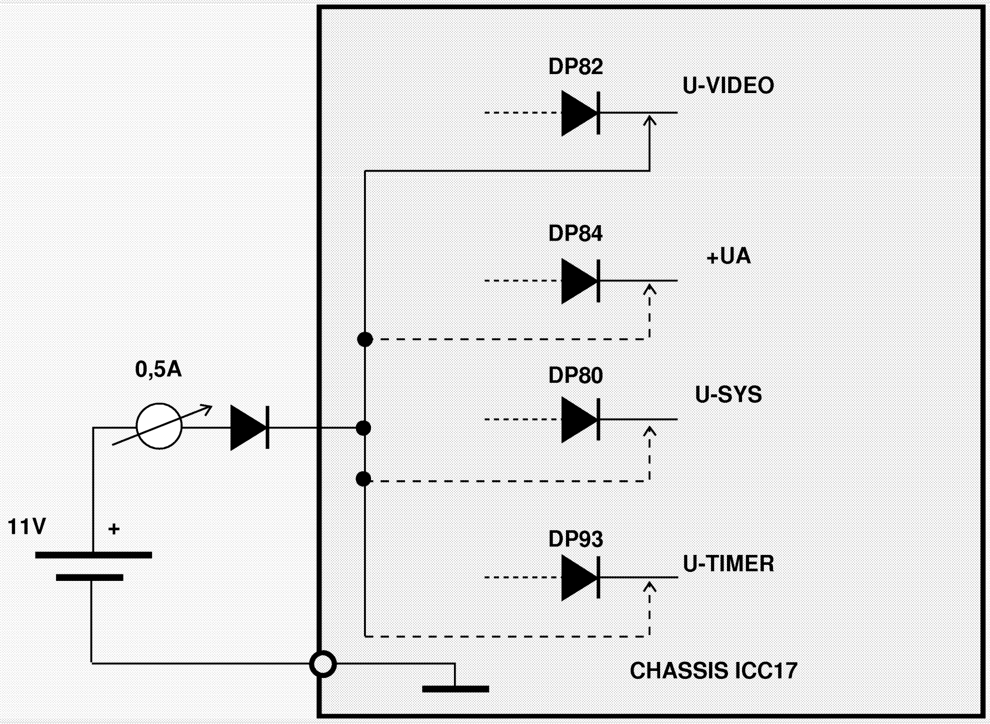
SERVICE MANUAL

SECONDARY DC-VOLTAGES

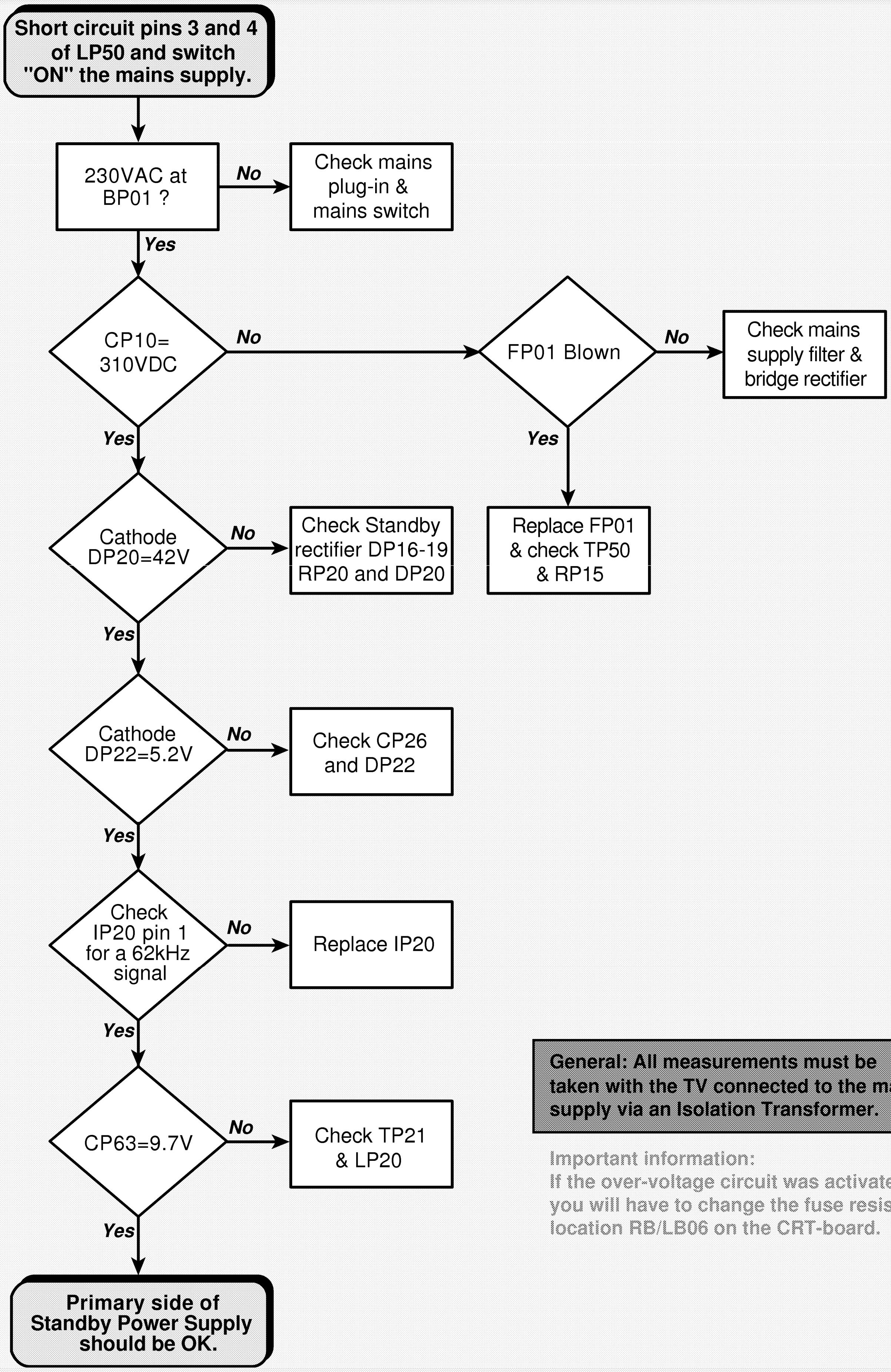
All measurements in this chapter must be done WITHOUT the mains supply connected to the TV.

Test circuit:

The external voltage source is provided by a variable DC-power supply with its output voltage set to 11V and the current limitation set to 500mA's. The negative terminal of the DC-power supply must be directly connected to the chassis secondary ground plane. The positive terminal of the DC-power supply is first connected to an ammeter and then the anode of an isolation diode. The cathode of the isolation diode is then connected to the load on the chassis as shown below. Measure the current drawn by each load tested.



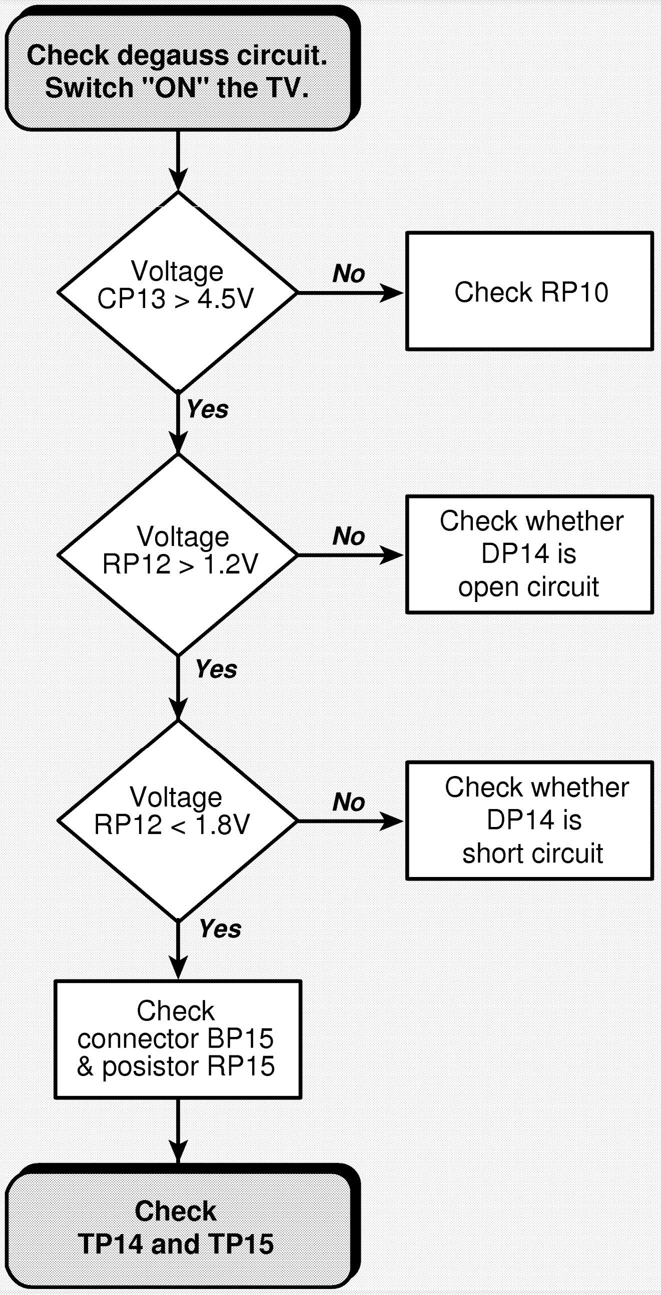
STANDBY POWER SUPPLY - PRIMARY SIDE


Short circuit pins 3 and 4 of LP50 and switch "ON" the mains supply.
230VAC at BP01 ?
No
Check mains plug-in & mains switch
Yes
CP10= 310VDC
No
FP01 Blown
No
Check mains supply filter & bridge rectifier
Yes
Replace FP01 & check TP50 & RP15
Yes
Cathode DP20=42V
No
Check Standby rectifier DP16-19 RP20 and DP20
Yes
Cathode DP22=5.2V
No
Check CP26 and DP22
Yes
Check IP20 pin 1 for a 62kHz signal
No
Replace IP20
Yes
CP63=9.7V
No
Check TP21 & LP20
Yes
Primary side of Standby Power Supply should be OK.

General: All measurements must be taken with the TV connected to the mains supply via an Isolation Transformer.

Important information:
If the over-voltage circuit was activated, you will have to change the fuse resistor at location RB/LB06 on the CRT-board.

DEGAUSSING CIRCUIT

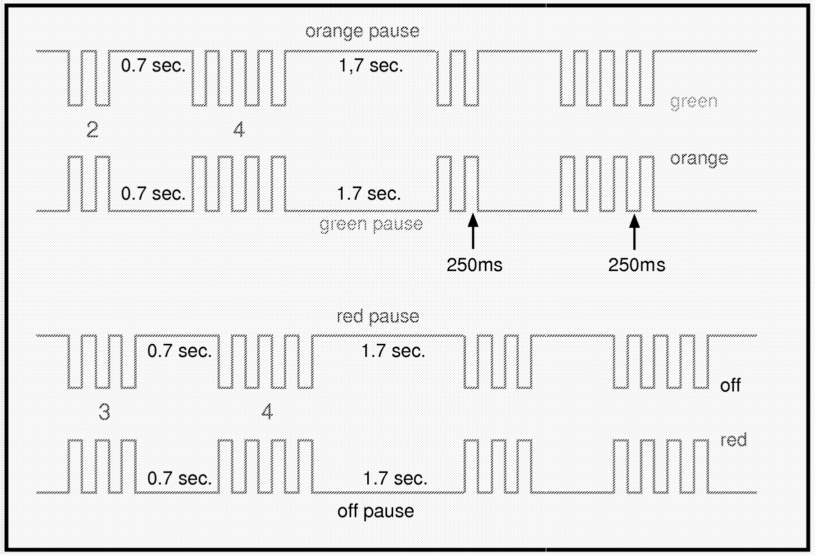

Check degauss circuit.
Switch "ON" the TV.
Voltage
CP13 > 4.5V
No
Check RP10
Yes
Voltage
RP12 > 1.2V
No
Check whether
DP14 is
open circuit
Yes
Voltage
RP12 < 1.8V
No
Check whether
DP14 is
short circuit
Yes
Check
connector BP15
& posistor RP15
Check
TP14 and TP15

GENERAL INFORMATION - LED BEHAVIOUR

LED FLASHES

Error message transmission.
The error codes are signalled by the TV's red LED .

Count the number of flashes : the error code is two burst separated by a pause of 0.7 sec. and repeated four times. There is 1.7 sec between each codes sequence.

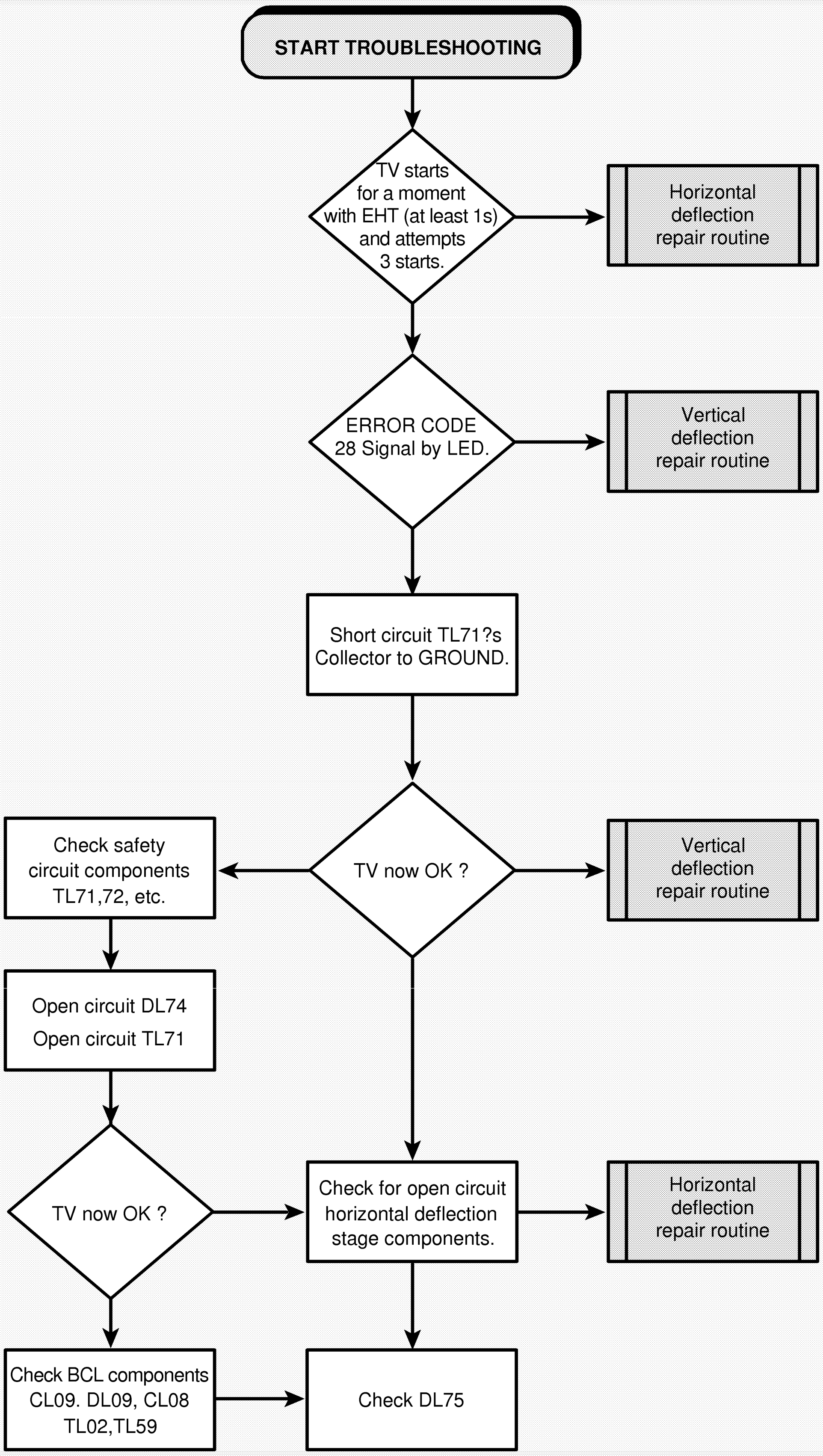


Currently all ICC17 TV sets are fitted with a Bicoloured LED, the red part is the Standby LED whilst, the green part is directly connected to the switched +8V supply. Therefore, the colour of the LED will depend upon the state of this voltage, the chart below gives the corresponding LED-colours:

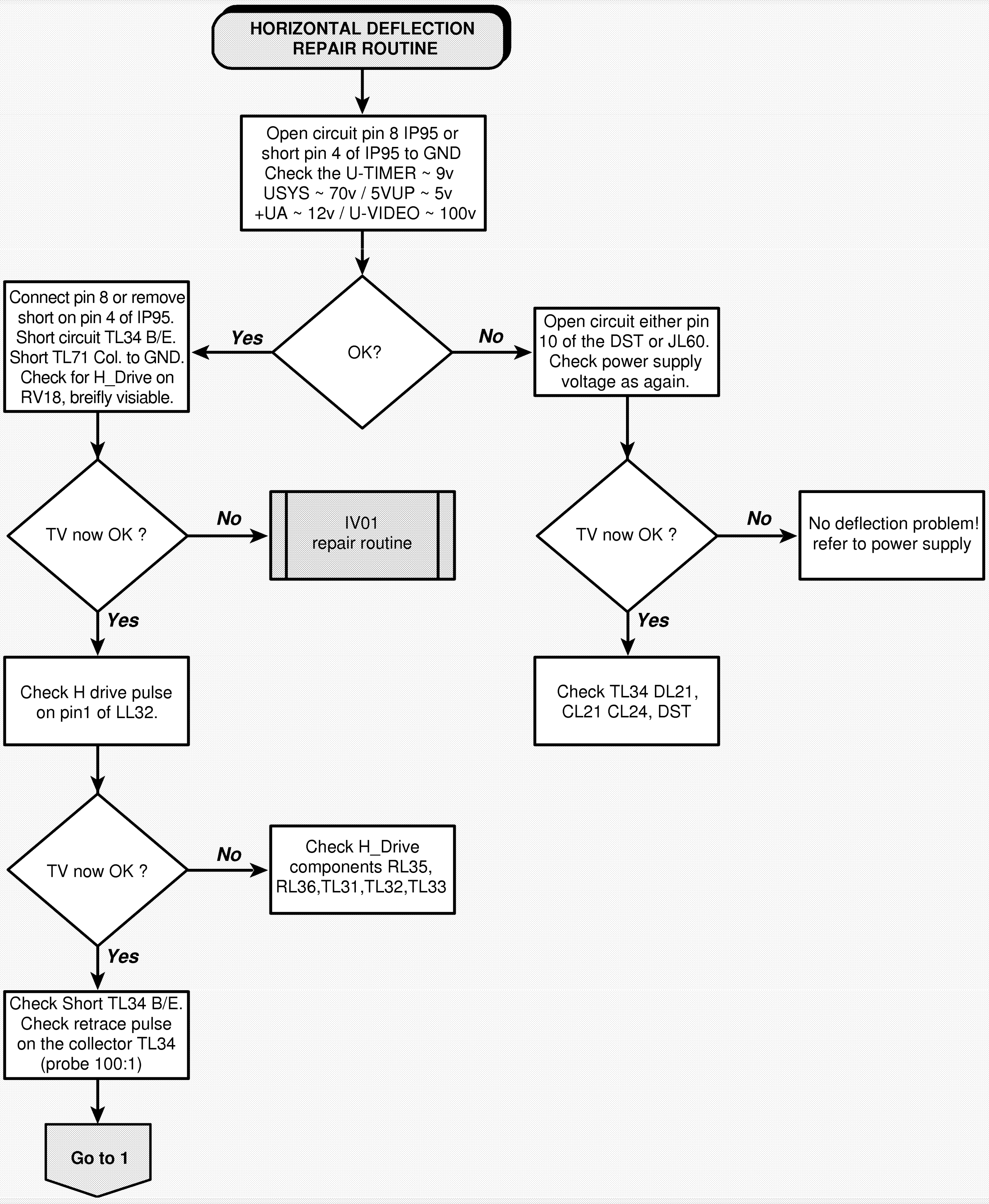
	LED-port	
switched +8 V	off	on
on	green	orange
off	off	red

CODES	DEFAULTS
12	AUDIO-DPL DOES NOT ANSWER
14	TDA8855H DOES NOT ANSWER
15	AUDIO-MSP PROCESSOR NO LONGER RESPONDING
19	TUNER DOES NOT ANSWER
21	SDA LINE BEING HELD LOW
23	CLOCK HELD AT LOW LEVEL, SCL LINE HELD AT A LOW LEVEL
25	SWITCHED 5V NOT AVAILABLE
26	TUBE DOES NOT GET WARM IN TIME
27	THE DEFLECTION STAGE HAS DETECTED A FAULT ON MORE THAN THREE OCCASIONS
28	TDA VERTICAL GUARD VOLTAGE EXCEEDED
29	TDA HORIZONTAL GUARD VOLTAGE EXCEEDED
31	INTERNAL SOFTWARE ERROR
32	A SOFTWRE-TIMER HAS BEEN REQUESTED, BUT IS NOT YET AVAILABLE
34	THE NVM CHIP DOES NOT ANSWER
35	+13V IS NOT AVAILABLE
36	WRONG NVRAM ADDRESS PASSED TO THE BUS - HANDLER
37	UNEXPECTED LEVEL ON NMI (INTERRUPT) LINE FOUND (POSSIBLE CAUSE : TUBE FLASHOVER)
38	HEAP FULL
41	BUS (DATA LINE) NOT RECOVERABLE

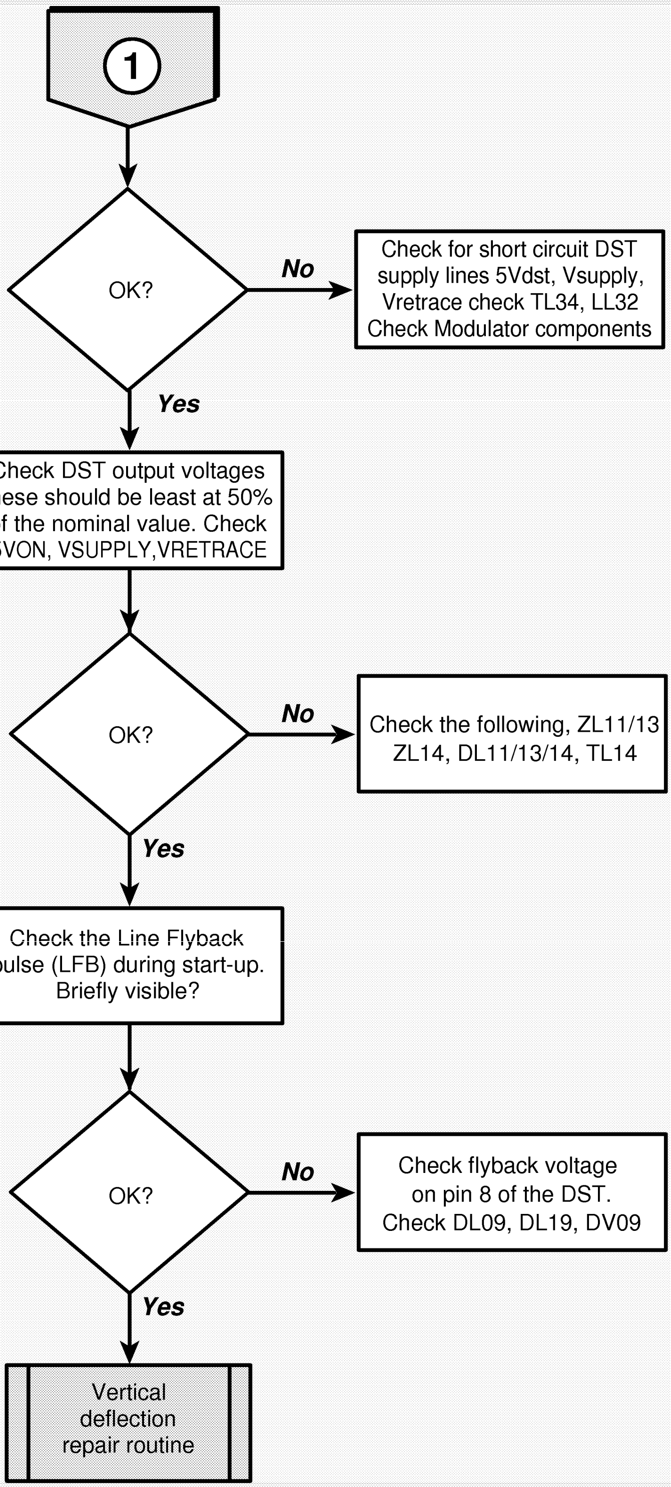
DEFLECTION CIRCUIT CHECK


START TROUBLESHOOTING
TV starts for a moment with EHT (at least 1s) and attempts 3 starts.
Horizontal deflection repair routine
ERROR CODE 28 Signal by LED.
Vertical deflection repair routine
Short circuit TL71?s Collector to GROUND.
Check safety circuit components TL71,72, etc.
TV now OK ?
Vertical deflection repair routine
Open circuit DL74
Open circuit TL71
TV now OK ?
Check for open circuit horizontal deflection stage components.
Horizontal deflection repair routine
Check BCL components CL09. DL09, CL08 TL02,TL59
Check DL75

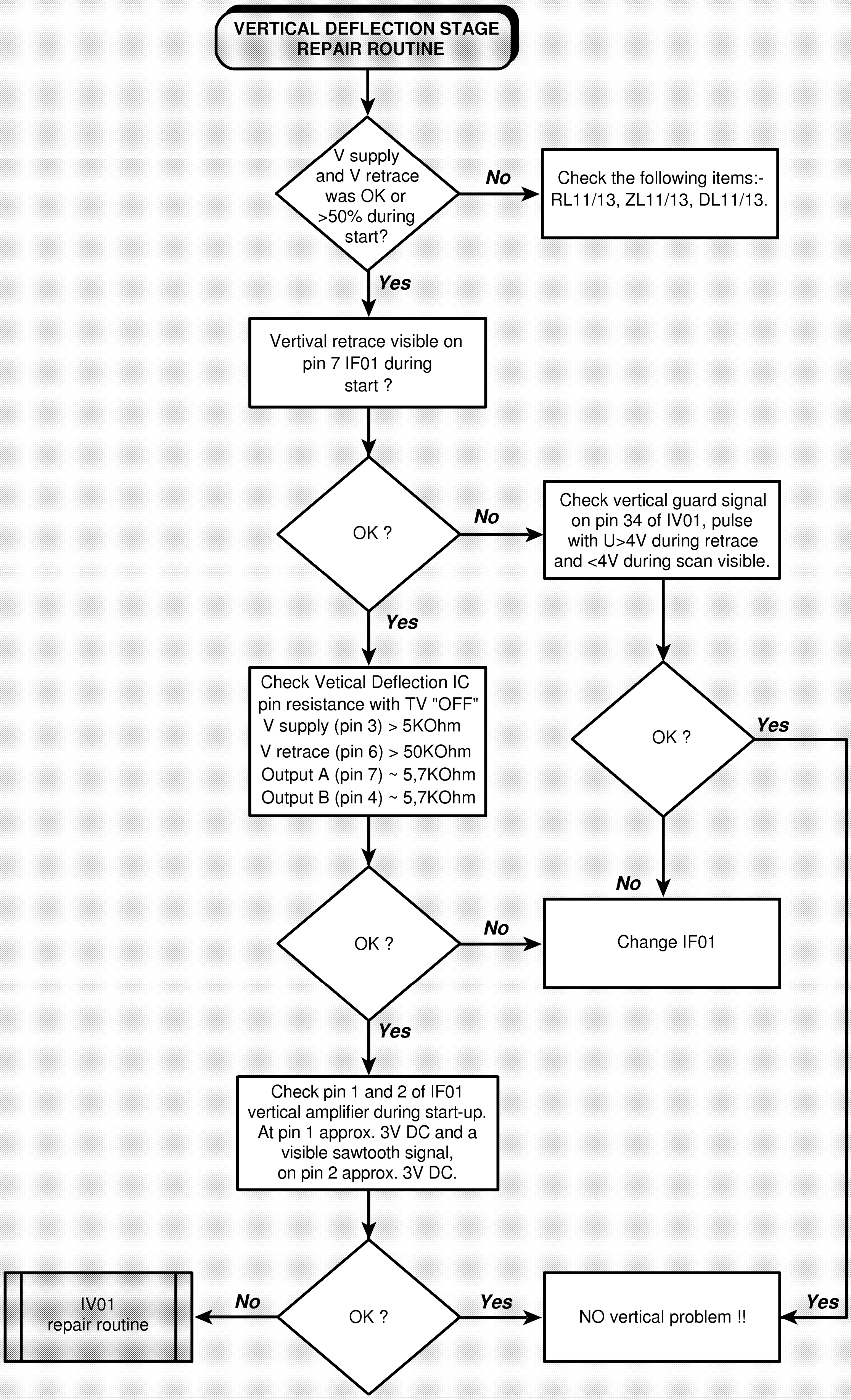
DEFLECTION CIRCUIT CHECK


HORIZONTAL DEFLECTION REPAIR ROUTINE
Open circuit pin 8 IP95 or short pin 4 of IP95 to GND Check the U-TIMER ~ 9v USYS ~ 70v / 5VUP ~ 5v +UA ~ 12v / U-VIDEO ~ 100v
OK?
Yes
No
Connect pin 8 or remove short on pin 4 of IP95. Short circuit TL34 B/E. Short TL71 Col. to GND. Check for H_Drive on RV18, breifly visiable.
Open circuit either pin 10 of the DST or JL60. Check power supply voltage as again.
TV now OK ?
No
IV01 repair routine
Yes
TV now OK ?
No
No deflection problem! refer to power supply
Yes
Check H drive pulse on pin1 of LL32.
Check TL34 DL21, CL21 CL24, DST
TV now OK ?
No
Check H_Drive components RL35, RL36,TL31,TL32,TL33
Yes
Check Short TL34 B/E. Check retrace pulse on the collector TL34 (probe 100:1)
Go to 1

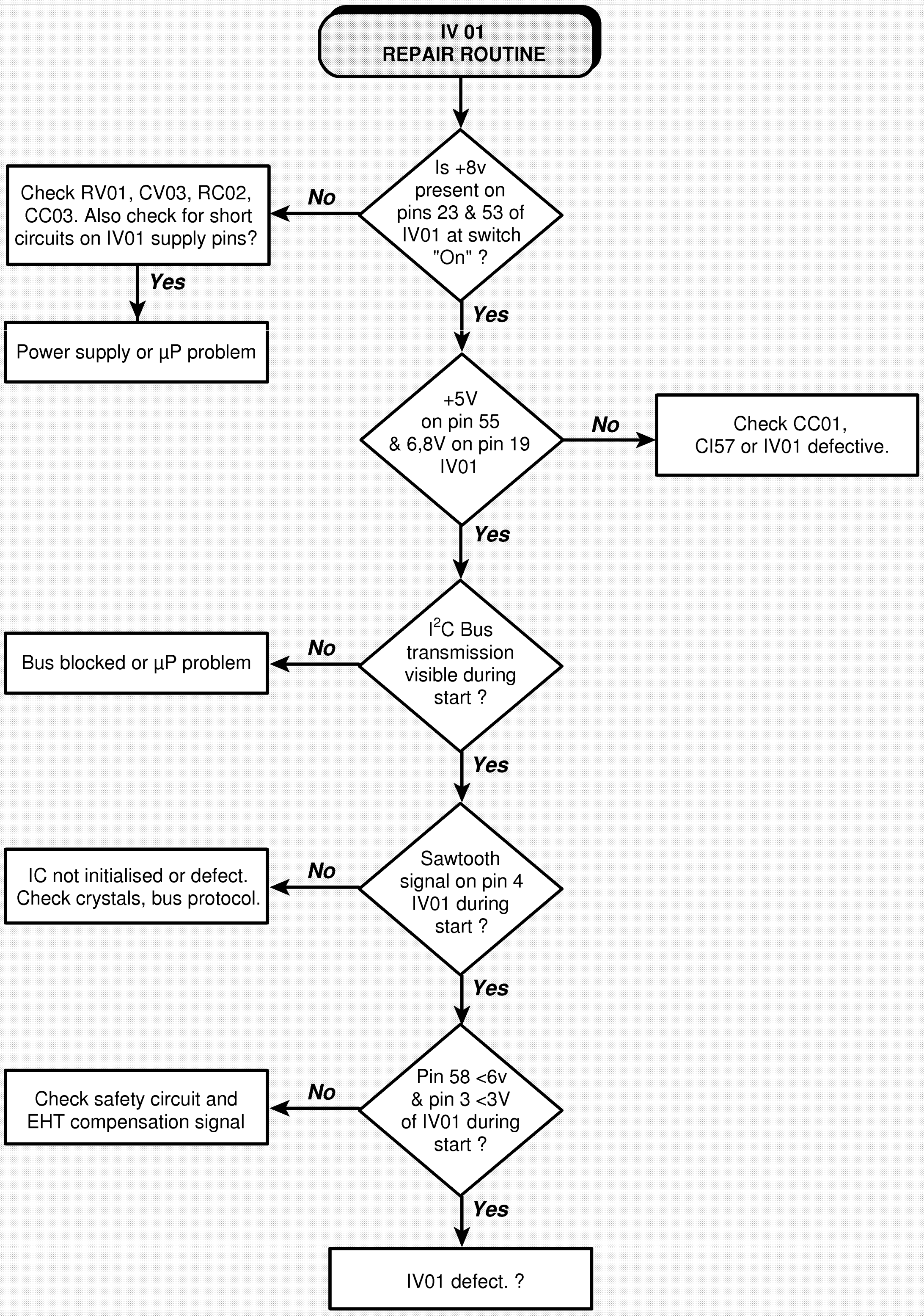
DEFLECTION CIRCUIT CHECK


1
OK?
No
Check for short circuit DST supply lines 5Vdst, Vsupply, Vretrace check TL34, LL32 Check Modulator components
Yes
Check DST output voltages these should be least at 50% of the nominal value. Check 5VON, VSUPPLY,VRETRACE
OK?
No
Check the following, ZL11/13 ZL14, DL11/13/14, TL14
Yes
Check the Line Flyback pulse (LFB) during start-up. Briefly visible?
OK?
No
Check flyback voltage on pin 8 of the DST. Check DL09, DL19, DV09
Yes
Vertical deflection repair routine

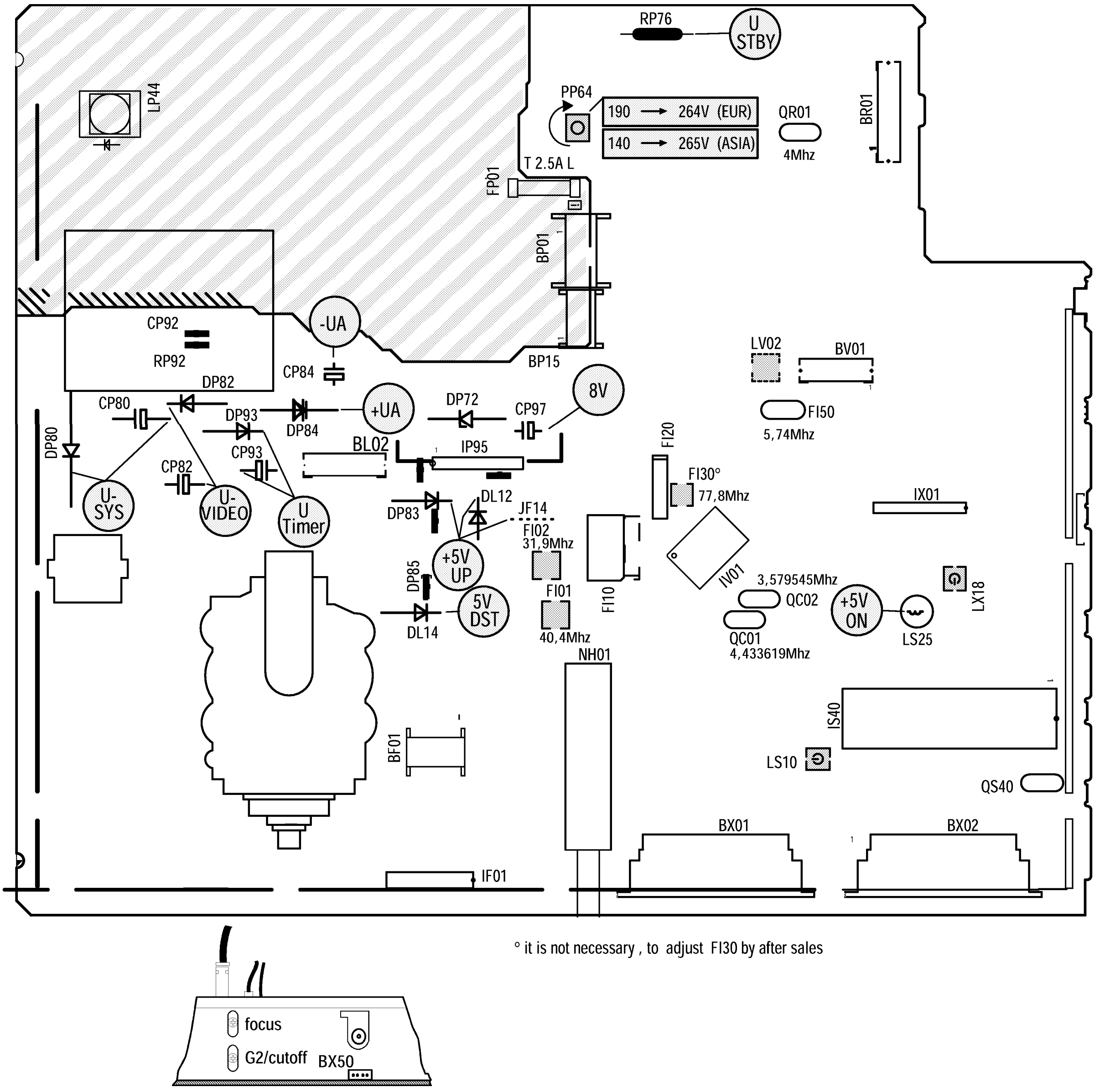
DEFLECTION CIRCUIT CHECK


VERTICAL DEFLECTION STAGE
REPAIR ROUTINE
V supply and V retrace was OK or >50% during start?
No
Check the following items:- RL11/13, ZL11/13, DL11/13.
Yes
Vertival retrace visible on pin 7 IF01 during start ?
OK ?
No
Check vertical guard signal on pin 34 of IV01, pulse with U>4V during retrace and <4V during scan visible.
Yes
Check Vetical Deflection IC pin resistance with TV "OFF"
V supply (pin 3) > 5KOhm
V retrace (pin 6) > 50KOhm
Output A (pin 7) ~ 5,7KOhm
Output B (pin 4) ~ 5,7KOhm
OK ?
Yes
No
OK ?
No
Change IF01
Yes
Check pin 1 and 2 of IF01 vertical amplifier during start-up. At pin 1 approx. 3V DC and a visible sawtooth signal, on pin 2 approx. 3V DC.
IV01
repair routine
No
OK ?
Yes
NO vertical problem !!
Yes

DEFLECTION CIRCUIT CHECK


IV 01
REPAIR ROUTINE
Is +8v present on pins 23 & 53 of IV01 at switch "On" ?
No
Check RV01, CV03, RC02, CC03. Also check for short circuits on IV01 supply pins?
Yes
Power supply or µP problem
Yes
+5V on pin 55 & 6,8V on pin 19 IV01
No
Check CC01, CI57 or IV01 defective.
Yes
I^2C Bus transmission visible during start ?
No
Bus blocked or µP problem
Yes
Sawtooth signal on pin 4 IV01 during start ?
No
IC not initialised or defect. Check crystals, bus protocol.
Yes
Pin 58 <6v & pin 3 <3V of IV01 during start ?
No
Check safety circuit and EHT compensation signal
Yes
IV01 defect. ?

LOCATION OF CONTROLS - EMPLACEMENT DES REGLAGES - SERVICE LAGEPLAN - POSIZIONE REGOLATORI DI SERVIZIO - SITUACIÓN DE LOS AJUSTES

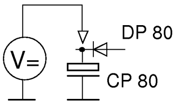
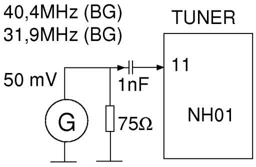
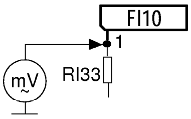
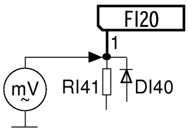
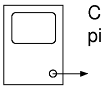
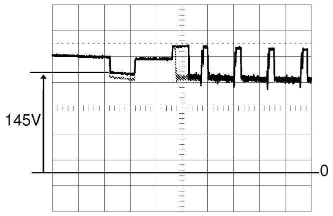
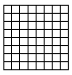
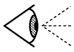

RP76
U STBY
LP44
PP64
190 ⟶ 264V (EUR)
140 ⟶ 265V (ASIA)
QR01
4Mhz
BR01
T 2.5A L
FP01
BP01
CP92
RP92
-UA
CP84
BP15
DP82
CP80
DP93
DP84
+UA
DP72
CP97
8V
LV02
BV01
FI50
5,74Mhz
DP80
CP93
BL02
IP95
FI20
CP82
FI30°
77,8Mhz
IX01
U-SYS
U-VIDEO
U Timer
DP83
DL12
JF14
FI02
31,9Mhz
IV01
3,579545Mhz
DP85
+5V UP
FI01
FI10
QC02
+5V ON
LX18
5V DST
DL14
40,4Mhz
QC01
4,433619Mhz
LS25
NH01
IS40
BF01
LS10
QS40
BX01
BX02
IF01
focus
G2/cutoff
BX50

° it is not necessary , to adjust FI30 by after sales

▨ Part of board connected to mains supply.
Partie du châssis reliée au secteur.
Primärseite des Netzteils.
Parte dello châssis collegata alla rete.
Parte del chassis conectada a la red.

⚠ Use isolating mains transformer -
Utiliser un transformateur isolateur du secteur -
Trenntrafo verwenden -
Utilizar un transformador aislador de red -
Utilizzare un trasformatore per isolarvi dalla rete

ADJUSTMENTS - REGLAGES - EINSTELLUNGEN - REGOLAZIONI - AJUSTES

<table>
<tr>
<td>U Sys</td>
<td>PP 64</td>
<td>◐ + ☼ + ◕ = 50%
TV to AV1 : Black test pattern</td>
<td>
</td>
<td>
<table>
<tr><th>Tube</th><th>Format</th><th>Usys</th><th>Jumper</th><th>RL65</th></tr>
<tr><td>A51EBV13X01</td><td>4:3</td><td>128V+/-0,5V</td><td>JL80</td><td>4k7</td></tr>
<tr><td>A51EFS83X191</td><td>4:3</td><td>126V+/-0,5V</td><td>JL80</td><td>4k7</td></tr>
<tr><td>A59EHJ43X15</td><td>4:3</td><td>132V+/-0,5V</td><td>JL81</td><td>24k</td></tr>
<tr><td>A66EHJ43X15</td><td>4:3</td><td>132V+/-0,5V</td><td>JL81</td><td>24k</td></tr>
<tr><td>A59EGD048X30</td><td>4:3</td><td>126V+/-0,5V</td><td>JL80</td><td>4k7</td></tr>
<tr><td>A68EGD038X30</td><td>4:3</td><td>126V+/-0,5V</td><td>JL80</td><td>4k7</td></tr>
<tr><td>A68EGD038X70</td><td>4:3</td><td>126V+/-0,5V</td><td>JL80</td><td>4k7</td></tr>
<tr><td>A68AGA25X01</td><td>4:3</td><td>126V+/-0,5V</td><td>JL80</td><td>4k7</td></tr>
<tr><td>A80AEJ15X01</td><td>4:3</td><td>126V+/-0,5V</td><td>JL80</td><td>4k7</td></tr>
<tr><td>A80AEJ15X99</td><td>4:3</td><td>126V+/-0,5V</td><td>JL80</td><td>4k7</td></tr>
<tr><td>W56EGV023X015</td><td>16:9</td><td>138V+/-0,5V</td><td>JL82</td><td>47k</td></tr>
<tr><td>W66EGV023X015</td><td>16:9</td><td>138V+/-0,5V</td><td>JL82</td><td>47k</td></tr>
<tr><td>W76EGV023X015</td><td>16:9</td><td>138V+/-0,5V</td><td>JL82</td><td>47k</td></tr>
</table>
</td>
</tr>
<tr>
<td rowspan="2">IF Alignment
Alignement FI</td>
<td>trap 40.4Mhz
FI 01</td>
<td rowspan="2">Switch set to standard BG
Commuter le TV au standard BG
IF Signal
40,4MHz (BG)
31,9MHz (BG)

</td>
<td>
</td>
<td>Adjust FI01 for minimum value at 40,4Mhz</td>
</tr>
<tr>
<td>trap 31.9Mhz
FI 02</td>
<td>
</td>
<td>Adjust FI02 for minimum value at 31,9Mhz</td>
</tr>
<tr>
<td>U G2 / cutoff</td>
<td>SCREEN</td>
<td>◐ + ☼ + ◕ = 50%
AV (no Signal, black screen)</td>
<td>
CRT IB01:
pins 9 / 12 / 15
highest output</td>
<td>
</td>
</tr>
<tr>
<td>FOCUS</td>
<td>FOCUS
LL05</td>
<td>
Test pattern
(standard values)</td>
<td></td>
<td>Sharp picture</td>
</tr>
</table>

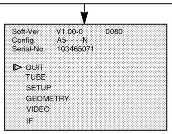
MODO SERVICIO (E)

I -ENTRADA/SALIDA MODO SERVICIO

1 ACCESO AL MODO SERVICIO

Acceso con panel control TV

- Con el mando a distancia conectar a STANDBY el televisor. Desconectar el aparato con el interruptor de la red (esperar hasta que el LED se apague).
- Pulse los botones **PR -** y **VOL -** y sin soltarlos,pulsar la tecla MARCHA:PARADA.
- Libere los botones **PR -** y **VOL -** (8S).



```
Soft-Ver     V1.00-0      0080
Config.      A5- - - -N
Serial-No.   103465071

▷ QUIT
  TUBE
  SETUP
  GEOMETRY
  VIDEO
  IF
```

Nota :

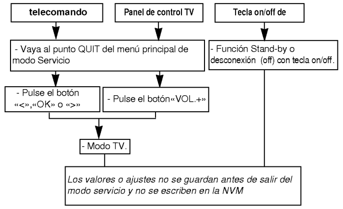
En modo servicio:
- Se ignora la función de bloqueo y se inicializa la función “cerradura niños”.
- Anula todos las horas programadas
- La patilla 8 del SCART es ignorada
- La detección WSS AV Link, EPG, y Telexto son desactivados.
- El apagado automático en caso de ausencia de señal de antena es desactivado.
- El contraste,color y brillo son puestos a los valores de fábrica.
- la nitidez es puesta al punto medio.
- La expansión de contrast al nivel bajo
- Modo Instalación es desactivado.
- Zoom y formato ignorados.

2 SALIDA TEMPORAL DEL MODO SERVICIO

- Pulse Salir en el mando a distancia
- Con el botón Menu puede acceder al menú de uso cotidiano.

- Puede entrar al Menú Servicio con el botón azul.

3 SALIDA DEL MODO SERVICIO



telecomando

Panel de control TV

Tecla on/off de

- Vaya al punto QUIT del menú principal de modo Servicio

- Función Stand-by o desconexión (off) con tecla on/off.

- Pulse el botón «<»,«OK» o «>»

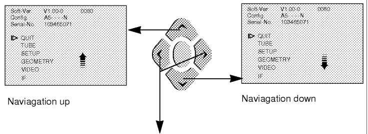
- Pulse el botón«VOL.+»

- Modo TV.

Los valores o ajustes no se guardan antes de salir del modo servicio y no se escriben en la NVM

II - NAVIGATION INSIDE THE SERVICE MODE - DEPLACEMENT DANS LE MODE SERVICE FUNCTIONS WALLIN SERVICE MODE - OPZIONI NEL SERVICE MODE - BUSQUEDA EN MODO SERVICIO

1 REMOTE CONTROL - TELECOMMANDE - FERNBEDIENUNG TELECOMANDO - MANDO A DISTANCIA


Soft-Ver V1.00-0 0080
Config. A5- - - -N
Serial-No. 103465071
QUIT
TUBE
SETUP
GEOMETRY
VIDEO
IF

Naviagation up

Naviagation down

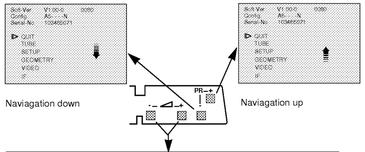
- Select option
- Option anwählen
- Selezionare l’opzione
- Seleccionar opción

- “Change“ value
- Wert “änden“
- “Cambiare“ valore
- “Cambiar“ valor

> → VALUE ↗

< → VALUE ↘

2 TV CONTROL PANEL - CLAVIER TV - TASTATUR DES FERNSEHGERÄTS - COMANDI DEL TELEVISORE -


Soft-Ver V1.00-0 0080
Config. A5- - - -N
Serial-No. 103465071
QUIT
TUBE
SETUP
GEOMETRY
VIDEO
IF
PR – +
- – +

Naviagation down

Naviagation up

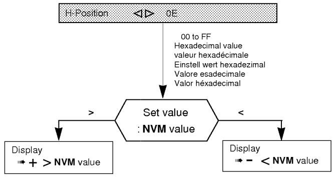
- Select option
- Option anwählen
- Selezionare l’opzione
- Seleccionar opción

- “Change“ value
- Wert “änden“
- “Cambiare“ valore
- “Cambiar“ valor

Vol. + → VALUE ↗

Vol. – → VALUE ↘

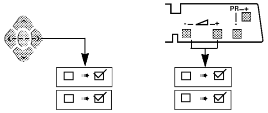
3 DISPLAYING THE VALUE OF THE SETTING - AFFICHAGE DES VALEURS - ANZEIGE DES EINSTELL WERTS VISUALIZZAZIONE DEL VALORE DELLA REGOLAZIONE - VISUALIZACION DEL VALOR DE AJUSTE


H-Position ◁▷ 0E
00 to FF
Hexadecimal value
valeur hexadécimale
Einstell wert hexadezimal
Valore esadecimale
Valor héxadecimal
Set value
: NVM value
>
<
Display
➡ + > NVM value
Display
➡ − < NVM value

4 TOGGLE FUNCTIONS - VALIDATION DES FONCTIONS EIN-UND AUSSCHALT FUNKTIONEN - FUNZIONI DI COMMUTAZIONE - FUNCION CONMUTACION

To enable a function check (tick) ☑ the box.
Pour valider une fonction cocher ☑ la case correspondante
Zum Implementieren einer Funktion das Kontrollkästchen ☑ aktivieren (ankreuzen)
Per implementare una funzione di verifica, (vistare) ☑ la casella
Para poner en fucionamiento una función verifique (señale) ☑ la casilla

☑ : :Enable function ☐ : Disable function



5 STORING VALUES IN MEMORY - MEMORISATION DES VALEURS - SPEICHERN DER WERTE - MEMORIZZAEZ I VALORI - VALORES ALMACENADOS EN LA MEMORIA

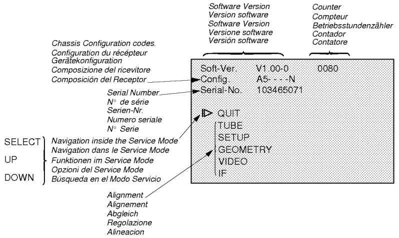
After setting, the values are stored in NVM.
Après réglages les valeurs sont mémorisées en NVM.
Nach dem Einstellen werden die Werte im NVM gespeichert.
Dopo la regolazione i valori vengono memorizzati in NVM.
Después del ajuste, los valores son almacenados en NVM

The box ☐ becomes ☑
During alignment, values are temporarily stored in RAM.
En cours d’alignement les valeurs sont mémorisées temporairement en RAM
Während des Abgleichs werden die Werte vorübergehend im RAM gespeichert
Durante l’allineamento i valori vengono memorizzati provvisoriamente sulla RAM
Durante el ajuste, los valores son almacenados temporalmente en RAM

Store ➡	Copîes RAM values into NVM Copie la valeur RAM en NVM Kopieren des Werts von RAM nach NVM Copiare i valori RAM in NVM Copiar valores RAM en NVM
Restore ➡	Copies all values from NVM into RAM. Copie toutes les valeurs des données NVM en RAM Kopiert alle NVM-Datenwerte in den RAM Copiare tutti i valori da NVM sulla RAM Copia todos los valores de NVM a RAM
ROM Default ➡	All the default values of a page in use are stored in RAM. L’ensemble des valeurs par défaut d’une page courante est chargé en RAM. Sämtliche Standardwerte der aktuellen Seite werden im RAM geladen Tutti i valori di default di una pagina in uso vengono memorizzati sulla RAM Todos los valores por defecto de la página en curso están almacenados en RAM.

III - LITE-MENU FOR FIELD SERVICE MODE - MENUS DU MODE SERVICE

1 MAIN MENU - MENU PRINCIPAL


Software Version
Version software
Software Version
Versione software
Versión software
Counter
Compteur
Betriebsstundenzähler
Contador
Contatore
Chassis Configuration codes.
Configuration du récépteur
Gerätekonfiguration
Composizione del ricevitore
Composición del Receptor
Serial Number
N° de série
Serien-Nr.
Numero seriale
N° Serie
SELECT
UP
DOWN
Navigation inside the Service Mode
Navigation dans le Service Mode
Funktionen im Service Mode
Opzioni del Service Mode
Búsqueda en el Modo Servicio
Alignment
Alignement
Abgleich
Regolazione
Alineacion
Soft-Ver. V1.00-0 0080
Config. A5- - - -N
Serial-No. 103465071
QUIT
TUBE
SETUP
GEOMETRY
VIDEO
IF

TV CONFIGURATION - CONFIGURATION DU TV - GERÄTEKONFIGURATION - CONFIGURAZIONE DEL TV - CONFIGURACIÕN DEL TV

Config. A1Z-DKC

Character 1 : Tube type : «A»= 4/3 , «W» =16/9
Character 2 : Chassis type : «5» = 50Hz,
Character 3 : Zoom available : «Z»=yes, «-»=not
Character 4 : Ambiant Sensor : «S»= detected, «-»= not
Character 5 : Dolby : «D»=detected, «-»= not
Character 6 : AV Link detected : «K»=IR link detected, «-»= not
Character 7 : Chassis Variant: «N»= Nicam, «S»=Stereo

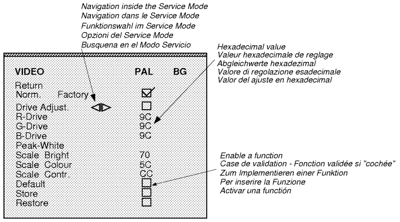
Serial-N0. AI6------

Character 1 : Factory : «A»= Angers , «C» =Celle, «T» =Tarancon
Character 2 : Year : «G» = 1996, «H»= 1997 etc..
Character 3 : Month, from : «1»=January to «C»=December
Character 4-9 : Serial N0.

TIME COUNTER - COMPTEUR DE TEMPS - BETRIEBSSTUNDENZÄHLER - CONTATORE - CONTADOR

The counter indicates the TV’s number of service hours.It counts from to 0 to 65535 hours. The display is hexadecimal.
Le compteur de temps indique le nombre d’heures de service du TV. Il compte de 0 à 65535 heures. L’affichage est en hexadécimal.
Der Zähler zeigt an, wieviele Stunden der Fernseher in Betrieb ist. Die Anzeige ist hexadezimal.
Il contatore indica il numero di ore di servizio del TV. Puo’ contatore da 0 a 65535. La visualizzazione è esadecimale.
El contador indica el número de horas de servicio de la TV. Cuenta de 0 a 65535 horas. El visualizador es hexadecimal.

2 SUBMENU - SOUS-MENU


Navigation inside the Service Mode
Navigation dans le Service Mode
Funktionswahl im Service Mode
Opzioni del Service Mode
Busquena en el Modo Servicio
Hexadecimal value
Valeur hexadecimale de reglage
Abgleichwerte hexadezimal
Valore di regolazione esadecimale
Valor del ajuste en hexadecimal
Enable a function
Case de validation - Fonction validée si "cochée"
Zum Implementieren einer Funktion
Per inserire la Funzione
Activar una función

```
VIDEO                PAL    BG
Return
Norm.     Factory     ☑
Drive Adjust.   ◁▷    ☐
R-Drive               9C
G-Drive               9C
B-Drive               9C
Peak-White
Scale  Bright         70
Scale  Colour         5C
Scale  Contr.         CC
Default               ☐
Store                 ☐
Restore               ☐
```

ALIGNMENT PROCEDURE - PROCESSUS DE REGLAGES - ABGLEICH - VISUALIZZAZIONE DEL VALORE DI REGOLAZIONE - PROCEDIMIENTO DE ALINEACION

```
TUBE
Return
Tube type              A66ECY...
Store          ◁|▷     ☑
Restore                ☐
```

TUBE

Return

Closes the sub-menu and returns to the "Main Service Menu".

Retourne au menu principal.

Schließt das Untermenü, und das Servicemodus-Menü erscheint.

Chiude il sottomenu e fa apparire il menu principale Field Service Mode.

Cierra el submenú. El menú Field Service Mode aparece.

Press </>: remote control; Vol. +/- : TV keyb.

Tube type

After replacing the NVM, the correct tube type number must be entered (6 characters). Once entered, the tubes geometry and video default vales are immediately activated. Variable geometry and video parameters are written to the NVM when the "STORE" line is selected. See table below for tube type numbers.

Définit le tube exact après changement de NVM. Les nouvelles valeurs de tubes (avec video et géometrie) sont actives de suite. Les paramètres de vidéo et de géométrie sont chargés en NVM lorsque STORE est sélectionné. Voir liste ci-dessous.

Nach Tausch des NVM den Bildröhrentyp (6 Ziffern) auswählen. Die neuen Geometrie-und Video-Defaultwerte werden sofort aktiv. Variable Geometrie- und Videowerte werden durch Speichern mit "STORE" ins NVM geschrieben. Bildrohrauflistung : siehe unten.

Scegliere il tubo appropriato dopo aver sostituito la NVM; i 6 caratteri che indicano il nuovo tipo di tubo, richiamano i valori video e geometria di default. I parametri per video e geometria vengono caricati nella NVM

Definir el tubo correcto después de haber cambiado el NVM.6 caracteres.Los nuevos valores de tipo de tubo (con la vídeo y la geometría por defecto) se activan inmediatamente. Los parámetros variables de geometría y vídeo se graban en el NVM al seleccionar la función Store. Vea más abajo la lista de tubos.

⟶ After setting ⟶ Store (+) ☑

Tube Name	LIST name	Description
A51EFS83X191	A51EFS	4:3; 21" OT; AK-Mask; Coty-M
A59EHJ43X15	A59EHJ	4:3; 25" MP; AK-Mask; Vector
A66EHJ43X15	A66EHJ	4:3; 28" MP; AK-Mask; Vector
A68EGD038X30	A68EGD	4:3; 29" SF; Invar; Vector
A68EGD038X70	A68EGD	4:3; 29" SF; Invar; Vector
A80AEJ13X01	A80AEJ	4:3; 33" MP AK-Mask; Coty-M
A80AEJ15X99	A80AEJ	4:3; 33" MP AK-Mask; Coty-M
A59EGD048X30	A59EGD	4:3; 25" SF; Invar-Mask; Vector
A68AGA25X01	A68AGA	4:3; 29" VHP; AK-Mask; Coty-M
W56EGV023X015	W56EGV	16:9; 24" SF; Invar-Mask; Vector
W66EGV023X015	W66EGV	16:9; 28" SF; Invar-Mask; Vector
W76EGV023X015	W76EGV	16:9; 32" SF; Invar-Mask; Vector

```
SETUP
Return
Clear     Progs.   |▷
Brand*                Other
Kbd. Config.          Default
Bus Quiet             ☐
WSS                   ☐
Default               ☐
Store                 ☐
Restore               ☐
```

* *according to model - selon modèle - gemäß modell - Secondo modello - segun modelo .*

SETUP

Return

Closes the sub-menu and returns to the "Main Service Menu".

Retourne au menu principal.

Schließt das Untermenü, und das Servicemodus-Menü erscheint.

Chiude il sottomenu e fa apparire il menu principale Field Service Mode.

Cierra el submenú. El menú Field Service Mode aparece.

Press </>: remote control; Vol. +/- : TV keyb.

Clear Prog.

Clears all programmes STORED in memory and resets all PICTURE and SOUND settings to the factory default values . The AUTO INSTALL (out of factory) mode can be initialised by a long press (> 2.5sec.) of the selection button.

Efface tous les programmes mémorisés, initialise les valeurs SON et IMAGES aux valeurs usines et met le TV en mode de sortie usine "AUTO INSTALL". Fonction valide par une longue pression (>2.5s) sur la touche de sélection </>.

Löscht alle Programmplätze und setzt alle Bild- und Toneinstellungen auf Fabrikwerte zurück. Der AUTO-INSTALL-Modus kann durch einen langen Knopfdruck (>2,5s) initialisiert werden.

Clear Prog.
Cancella tutti i programmi in memoria e regola i Valori analogici SUONO IMMAGINE: ailivelli di fabbrica.Riportare la TV al modo Selezione: pressione prolungata: 2,5 sec.

Programa de borrado.
Borra todos los programas almacenados en la memoria.Valores analógicos de IMAGEN y SONIDO: valores de fábrica.Regreso a la TV para "salir del modo fábrica".Selección: Presión larga igual a 2,5 s.

Brand*

Set the "Brand": Thomson, Telefunken, Other

Factory adjusted
Reserve au reglage usine
Reserviert für Fabrikeinstellungen
Riservato alla regolazione di fabbrica
Ajuste reservado fábricas
Press </>: remote control; Vol. +/- : TV keyb.

Kbd. Config

Factory adjusted
Reserve au reglage usine
Reserviert für Fabrikeinstellungen
Riservato alla regolazione di fabbrica
Ajuste reservado fábricas

Kbd. Config ◁|▷ Other / Default

Press </>: remote control; Vol. +/- : TV keyb.

WSS

Automatic detection of DOLBY surround sound and 16/9 format pictures via Teletext line number 23 is valid on all programmes.

Détection automatique du son surround DOLBY et du format 16/9 via la ligne 23 du Teletxte. Valide pour tous programmes.

WSS (nur bei 16:9 oder Dolby)
Auswertung der Zeile 23 zur automatischen Format-und Dolbyumschaltung.

Identificazione "auto-surround" e "format" via televideo alla riga 23.La selezione di WSS Processing vale per tutti i programmi.

Detección "auto-surround" y "format" a través de la línea 23 de Teletext.La selección del procesamiento WSS es válida para todos los programas.

☑ Detection enable ☐ Detection disable

⟶ After setting ⟶ Store (+) ☑

SETUP

Bus Quiet

In bus quiet, the NVM can be read, modified and reprogrammed by means of a NVM Programmer. Accessing the Bus quiet : Long press ">".

The TV should remain in "Bus quiet" until there is a press of Exit, Left, Right, Up, Down or Standby keys on infrared or the local keyboard ; at which point TV should be warmstarted in order to avoid differences between NVM and RAM contents.

After returning from bus quiet, the software check the NVM content. If it is not valid, the software perform a new default writing of the NVM content.

En mode bus quiet la NVM peut être lue, modifiée et reprogrammée. Accès au mode Bus quiet : Longue pression ">".

Utiliser l'une des touches Exit, Gauche, Droite Haut, Bas, standby ou une des touches du clavier pour sortir le téléviseur du mode bus quiet. A partir de ce point de sortie le démarrage du téléviseur s'effectue à chaud pour éviter toute différence des contenus RAM et NVM.

En sortie de mode bus quiet, le logiciel contrôle le contenu de la NVM. S'il n'est pas correct le logiciel exécute une nouvelle écriture par défaut de celle-ci.

Im "Bus Quiet"-Modus kann der Inhalt des NVM mittels eines externen NVM-Programmiergerätes ausgelesen, geändert oder neu programmiert werden. "Bus Quiet" wird einem längeren Druck auf ">" aktiviert.

Das Gerät bleibt solange im "Bus Quiet" -Mode, bis durch Druck auf die EXIT-, LINKS-, RECHTS-, HOCH-, RUNTER- oder STANDBY-Taste (am Gerät oder auf der Fernbedienung) ein Warmstart des Gerätes veranlaßt wird, um unterschiedliche Daten in RAM und NVM zu vermeiden.

Es folgt ein Software-Check des NVM-Inhaltes. Sollte dieser nicht gültig sein, wird der Inhalt mit Default-Werten überschrieben.

In Modo Bus Quiet, la memoria NVM può essere letta, modificata o riprogrammata. Per accedere al modo Bus Quiet premere a lungo il tasto ">".

Il TV dovrebbe rimanere in modo Bus Quiet fino a che vengono premuti i tasti Exit, o Destro Sinistro, Su o Giù o Standby dal telecomando o dalla tastiera locale; a questo punto il TV dovrebbe ripartire per evitare interferenze tra i contenuti della memoria NVM e della RAM.

All'uscita dal modo Bus Quiet, il software controlla il contenuto della memoria NVM. Se tale contenuto non è valido, il software provvede a una nuova programmazione della NVM con l'inserimento dei dati di default.

En bus quieto, la NVM puede ser leída, modificada y reprogramada. Acceso a bus quieto : Larga presión en ">"

El TV permanecerá en bus quieto hasta que se pulse cualquiera de las teclas siguientes: Exit, "<", "Y", "/", ">"o Standby del telemando o del teclado. En este momento el TV arrancará para evitar cualquier diferencia entre los contenidos de la RAM y NVM.

Al salir del modo bus quieto, el software comprueba el contenido de la NVM. Si no coincide, el software ejecuta la escritura de los datos en la NVM.

☑ Bus quiet enable ☐ Bus quiet disable

⟶ After setting ⟶ Store (+) ☑

```
GEOMETRY
Return
V- Slope                7C
V-Amplitude             6C
V-Position     ◁|▷      7C
S - Correction          54
H-Position              94
H-Amplitude             70
EW-Amplitude            78
EW-Shape                50
EW-Trapezium            98
Default                 ☐
Store                   ☐
Restore                 ☐
```

GEOMETRY

Return

Closes the sub-menu and returns to the "Main Service Menu".

Retourne au menu principal.

Schließt das Untermenü, und das Servicemodus-Menü erscheint.

Chiude il sottomenu e fa apparire il menu principale Field Service Mode.

Cierra el submenú. El menú Field Service Mode aparece.

Press </>: remote control; Vol. +/- : TV keyb.

V-Slope

- **ATTENTION**: Select the standard 4:3 format for 4/3 tube or 16/9 format for 16/9 tube.
- Apply a test pattern signal to the TV with a single horizontal and vertical line on the screen.
- Select the **"V_Slope"** line of the menu. The bottom half of the screen will go black.
- Adjust V_Slope until the centre line of the pattern is just invisible.
- Leave the line **"V_Slope"**.
- Switch the test pattern signal to the crosshatch geometry pattern.
- Perform the geometry adjustments described below.
- Store

- **ATTENTION**: Sélectionner le format 4/3 pour tube 4/3 et le format 16/9 pour les TV 16/9.
- Appliquer une mire de barres avec seulement une ligne blanche horizontale en milieu de l'écran.
- Sélectionner la ligne **"V-Slope"**. La moitié basse de l'écran devient noire.
- Aligner **"V_Slope"** pour que la ligne médiane soit à peine non visible.
- Commuter la mire en mode de réglage de géométrie (quadrillage).
- Effectuer les reglages de geometrie ci- après.
- Memoriser

- **ACHTUNG**: Wählen Sie das 4:3 Format bei 4:3 Bildröhren oder 16:9 bei 16:9 Bildröhren.
- Speisen Sie ein Testbild mit einem horizontalen Strich in der Bildmitte ein.
- Wählen Sie im Menü die Funktion "V-Slope" an. Die untere Bildhälfte wird dunkel.
- Stellen Sie "V-Slope" so ein, daß die Mittellinie fast verschwindet.
- Verlassen Sie die Funktion "V-Slope".
- Speisen Sie ein Gittertestbild ein.
- Nehmen Sie die Geometrieeinstellungen wie nebenstehend beschrieben vor.

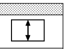
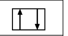
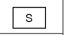
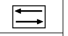
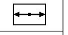
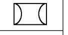
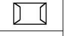
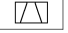
- **ATTENZIONE**: Selezionare il formato standard 4/3 per il cinescopio 4/3 e il formato 16/9 per il cinescopio 16/9.
- Applicare un monoscopio con un'unica linea bianca orizzontale al centro dello schermo
- Selezionare la riga **"V slope"** del menu. La parte bassa dello schermo viene oscurata.
- Allineare la "Vertical Slope" in modo che la linea centrale sia appena visibile
- Abbandonare la riga **"V slope"**.
- Posizionare il monoscopio
- Effettuare le regolazioni di geometria descritte in precedenza
- Memorizzare.

- **ATENCIÓN**: Seleccionar 4/3 para tubos de formato 4/3 y el formato 16/9 para tubos 16/9.
- Aplique una carta de ajuste con sólo una línea blanca horizontal y una vertical en el centro de la pantalla.
- Seleccionar en el menú, la línea **"V-Slope"**. La mitad inferior de la pantalla se pondrá oscura.
- Ajuste **"V-Slope"** justo hasta que la línea horizontal sea invisible.
- Cambiar la carta de ajuste a "cuadrícula" y efectuar los ajustes de geometría descritos a continuación
- Antes de salir, memorizar con "Store"

Press </>: remote control; Vol. +/- : TV keyb.

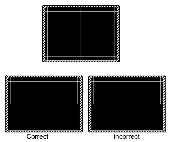
Test Pattern Signal used: 4/3 with geometric circle. Adjust separate for 4/3 and 16/9 format. See annexed

GEOMETRY

V-Amplitude	👁	
V-Position	👁	
S -Correction	👁	
H-Position	👁	
H-Amplitude	👁	
EW - Amplitude	👁	
EW - Shape	👁	
EW - Trapezium	👁	

⟶ After setting ⟶ Store (+) ☑

V-Slope :



Correct

incorrect

```
VIDEO                          PAL    BG
Return
Norm.  Factory                 ☑
Drive Adjust.       ◁|▷        ☐
R-Drive                        9C
G-Drive                        9C
B-Drive                        9C
Peak-White
Scale  Bright                  70
Scale  Colour                  5C
Scale  Contr.                  CC
Default                        ☐
Store                          ☐
Restore                        ☐
```

The signals colour standard is auto detected and displayed opposite the main menu line.
Select 4:3 mode for 4:3 TV sets and 16:9 mode for 16:9 TV sets.

VIDEO PAL

Return

Closes the sub-menu and returns to the "Main Service Menu".

Retourne au menu principal.

Schließt das Untermenü, und das Servicemodus-Menü erscheint.

Chiude il sottomenu e fa apparire il menu principale Field Service Mode.

Cierra el submenú. El menú Field Service Mode aparece.

Press </>: remote control; Vol. +/- : TV keyb.

Norm. Factory

Recalls the factory settings for colour, brightness, contrast and sharpness and sets Black Expand off.

☑ Factory settings recalled
☐ User settings kept.

Drive Adjust.*

☑ Enable before R/B/G-Drive and Peak White alignments.

☐ After the alignment is completed "Drive Adjustment" should be disabled.

R - Drive
G - Drive
B - Drive

👁 ▨ white

☼ + ◕ =50%
◐ =50% : AK mask tube
=70% : invar mask.
Grey scale test pattern white =100%
RF-BG, RF-L, AV1-RGB
Drives cannot be aligned in I (PAL)

Peak-White**

☼ + ◕ =50%
◐ =50% : AK mask tube
=70% : invar mask.
Peak white test pattern, white =100%
Colourimeter

Tube Type	[Nits]	Tube Type	[Nits]
A51EFS	420	A68EGD	350
A59EHJ	380	A80AEJ	240
A59EGD	400	W56EGV	520
A66EHJ	300	W66EGV	480
A68AGA	-	W76EGV	370

Adjustments : RF-BG, RF-L, RF-I, AV for CVBS, RGB

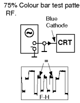
Scal. Brightness

👁

☼ + ◕ = 50%
◐ = 100%
Grey scale test pattern white =100%
▨ black

Scal. Colour

☼ + ◕ + ◐ =nom.
RF : BG-PAL, L-SECAM, I-PAL
75% Colour bar test pattern via RF.



Scal. Contrast

factory settings.

```
IF
Return
AGC Take  Over      ◁|▷    88

FFI  - Bit                 ☐

Default                    ☑
Store                      ☑
Restore                    ☑
```

IF

AGC

👁

- Minimum noise- Minimum de bruit
- Minimum Rauschen- Rumore minimo
- Minimo ruido

FFi - Bit

Fast filter (IF /PLL)
Filtre rapide (FI /PLL)
Schnelles Filter (ZF/PLL)
Filtro rapido (IF /PLL)

☑ Asie
☐ Europ

⟶ After setting ⟶ Store (+) ☑

Note :

* Before R/B/G Drive and Peak White alignments :
1- Blue Strech has to be switched on
2- Black Strech has to be switched off
3- Tone has to be set to Neutral
1-2-3 are all done by enabling the Drive Adjustment.
After the alignment the checkbox should be unchecked to display.
This action will restore the settings for Blue, Black Strech and Tone.

Avant l'alignement des Drives R/G/B:
1- L'extension "Bleu" doit être en fonction.
2- L'extension "Noir" doit être inhibée.
3- La tonalité doit être neutre.
1-2-3 sont effectués en validant la fonction Drive Adjust.
Après l'alignement il est nécessaire de désactiver "drive adjust." pour rétablir les valeurs des extensions Bleu, Noire et Tonalité.

Vor dem R/G/B/-Drive und dem Peak White Abgleich müssen Black Stretch und Blue Stretch abgeschaltet werden und der Farbton auf "neutral" gestellt werden. Dieses geschieht automatisch bei der Aktivierung des Abgleiches "Drive Adjust."
Nach dem Abgleich müssen die Funktionen durch ein erneutes Anklicken der Checkbox ("unchecken") "Drive Adjust. " wieder aktiviert werden.

Prima di allineare R/B/G Drive e Peak White:
1. Deve essere inserita la funzione Blue Stretch
2. Deve essere disattivata la funzione Black Stretch
3. Tone deve essere regolato su Neutral
Le funzioni 1,2,3 sono abilitate dal Drive Adjustment.
Dopo avere effettuato l'allineamento, disabilitare la linea Adjustment.
Questa funzione richiama le regolazioni Blue, Black, Stretch e Tone.

Antes de los ajustes R/G/B Drive y Peak White :
1 - La expansión del "azul" debe ser activada
2 - La expansión del "negro" debe ser desactivada
3 - La tonalidad debe ser neutra
Los pasos 1, 2 y 3 son efectuados validando los ajustes DRIVE.
Después de los ajustes, la casilla "Drive Adjust" debe ser desactivada.
Esta acción restaurará los valores "Blue", "Black", "Stretc y "Tone".

**When the Peak White is active R-Drive, G-Drive and B-Drive register values are changed in parallel (+/-1)

Lorsque l'on agit sur le réglage de Peak White les valeurs de registre R-Drive, G-Drive et B-Drive varient simultanément (+/-1).

Bei der Peak White-Einstellung werden die Register für R-Drive, G-Drive und B-Drive parallel (+/-1) geändert.

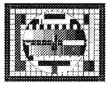
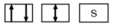
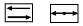
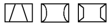
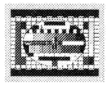
Quando "Peak White " è attivo, i valori di registro di R-Driv G-Drive e B-Drive vengono cambiati in parallelo (+/-1).

Cuando se activa el ajuste "Peak White", los valores de R-Drive, G-Drive y B-Drive varian simultáneamente (+/- 1

GEOMETRY MODE ALIGNMENT

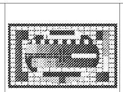
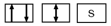
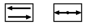
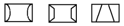
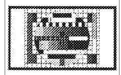
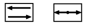
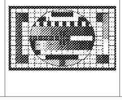
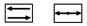
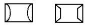
4/3 picture tube

Signal : 4/3 test pattern

4 / 3 standard mode zoom 0		overscan V=107% , H=107% 1- Adjust Vertical position and Vertical amplitude 2- Adjust S-correction  3- Store vertical geometry data. 4- Adjust Horizontal position and Horizontal ampltude  5- Adjust EW Amplitude ,EW Shape and Trapezium  6- Store geometry data.
16 / 9 standard mode zoom 0		- Control the vertical height : V = 80%

16/9 picture tube

Signal : 4/3 test pattern

16 / 9 standard mode zoom 0		overscan V=107%, H =107% 1- Adjust Vertical position and Vertical amplitude 2- Adjust S-correction.  3- Store vertical geometry data. 4- Adjust Horizontal position and Horizontal ampltude  5- Adjust EW Amplitude ,EW Shape and Trapezium  6- Store geometry data.
4 / 3 standard mode zoom 0		overscan V=107%, H =77% 1- Adjust Horizontal position and Horizontal ampltude  2- Adjust EW Amplitude 3- Store geometry data
4 / 3 cinerama zoom		overscan V=114%, H =104% 1- Adjust Horizontal position and Horizontal ampltude  2- Adjust EW Amplitude and the EW Shape  3- Store geometry data

ERROR CODES

GB

CODES	DEFAUTLS
12	AUDIO-DPL DOES NOT ANSWER
14	TDA8855H DOES NOT ANSWER
15	AUDIO-MSP PROCESSOR NO LONGER RESPONDING
19	TUNER DOES NOT ANSWER
21	SDA LINE BEING HELD LOW
23	CLOCK JAMMED AT LOW LEVEL,SCL LINE JAMMED AT AT LOW LEVEL
25	SWITCHED 5V NOT AVAILABLE
26	TUBE DOES NOT GET WARM IN TIME
27	THE DEFLECTION HAS DETECTED PROTECTION ON MORE THAN THREE OCCASIONS
28	TDA VERTICAL GUARD VOLTAGE EXCEEDED
31	INTERNAL SOFTWARE ERROR
32	A SOFTWRE-TIMER HAS BEEN REQUESTED, BUT IS NOT AVAILABLE YET
34	THE NVM CHIP DOES NOT ANSWER
35	+13V IS NOT AVAILABLE
36	WRONG NVRAM ADDRESS PASSED TO THE BUS - HANDLER
37	UNEXPECTED LEVEL ON NMI (INTERRUPT) LINE FOUND (POSSIBLE CAUSE : TUBE FLASHOVER)
38	HEAP FULL
41	BUS (DATA LINE) NOT RECVERABLE

F

CODES	DEFAUTS
12	PROCESSEUR AUDIO-DPL NE REPOND PLUS
14	TDA8855H NE REPOND PLUS
15	PROCESSEUR AUDIO-MSP NE REPOND PLUS
19	TUNER NE REPOND PLUS
21	LIGNE SDA AU NIVEAU BAS
23	CLOCK A NIVEAU BAS
25	5V COMMUTE N'EST PAS DISPONIBLE
26	PAS D'INFO TUBE CHAUD (APRES 25S)
27	PROTECTION BASE DE TEMPS ACTIVE PLUS DE TROIS FOIS
28	VERTICAL GUARD EXCESSIF
31	ERREUR LOGICIEL INTERNE
32	REQUETE LOGICIEL-TIMER DEMANDEE MAIS PAS ENCORE DISPONIBLE
34	PROBLEME NVM, MEMOIRE NE REPOND PLUS
35	+13V N'EST PAS DISPONIBLE
36	MAUVAISE ADRESSE NVM TRANSFEREE AU GESTIONNAIRE DE BUS
37	PROBLEME DETECTE SUR LA LIGNE NMI (HALT) PENDANT LE DEMARAGE OU LE FONCTIONNEMENT DU TV (POSSIBILITE : ARKING)
38	PILE LOGICIEL PLEINE
41	LIGNE DATA DU BUS I2C RESTE BLOQUEE

D

CODES	FEHLER
12	AUDIO-DPL ANTWORTET NICHT
14	TDA8855H ANTWORTET NICHT
15	1. AUDIO-MSP ANTWORTET NICHT
19	-
21	I2C-BUS DATA IST IMMER L
23	I2C-BUS CLOCK IST IMMER L
25	GESCHALTETE +5V NICHT VORHANDEN
26	BILDROHR WIRD NICHT INNERHALB VON 25S AUFGEHEIZT
27	SCHUTZSCHALTUNG HAT DREIMAL AUSGELÖST
28	TDA VERTIKAL SCHUTZ VGUARD IST AKTIVIERT WORDEN
31	INTERNER SOFTWAREFEHLER
32	EIN SOFTWARE-TIMER WURDE ANGEFORDERT, IST ABER NOCH NICHT BEREIT.
34	DAS EEPROM (NVM) ANTWORTET NICHT
35	+13V NICHT VORHANDEN
36	NVM ADRESSE NICHT GEFUNDEN
37	UNERWARTETER PEGEL AUF NMI (POWER_FAIL), MÖGLICHE URSACHE: SPANNUNGSÜBERSCHLAG
38	HEAP FULL
41	I2C-BUS (DATA) BLOCKIERT

I

CODICE	PROBLEMA
12	AUDIO - DPL NON RISPONDE
14	TDA8855H NON RISPONDE
15	PROCESSORE AUDIO NON RISPONDE PIŸ.
19	IL TUNER NON RISPONDE
21	LINEA SDA FORZATA BASSA
23	CLOCK BLOCCATO AL LIVELLO BASSO, LINEA TERRA BLOCCATA AL LIVELLO BASSO
25	LA TENSIONE 5V COMMUTATI NON DISPONIBILE
26	IL TUBO NON RAGGIUNGE LA CORRETTA TEMPERATURA NEL TEMPO STABILITO.
27	PIŸ DI 3 VOLTE LA RILEVAZIONE HA SCOPERTO UNA ÌPROTEZIONEÎ
28	ECCESSIVA TENSIONE ALLA LINEA VERTICAL GUARD DEL TDA
31	ERRORE INTERNO DEL SOFTWARE
32	E' STATO RICHIESTO UN SOFTWARE-TIMER, MA NON È ANCORA DISPONIBILE
34	IL CHIP NVM NON RISPONDE
35	+13V NON È DISPONIBILE
36	E' STATO TRASMESSO AL BUS UN INDIRIZZO ERRATO DELLA NVRAM
37	LIVELLO IMPREVISTO SULLA LINEA NMI
38	MEMORIA PIENA
41	BUS I2C (LINEA DATI) NON RIPRISTINABILE

E

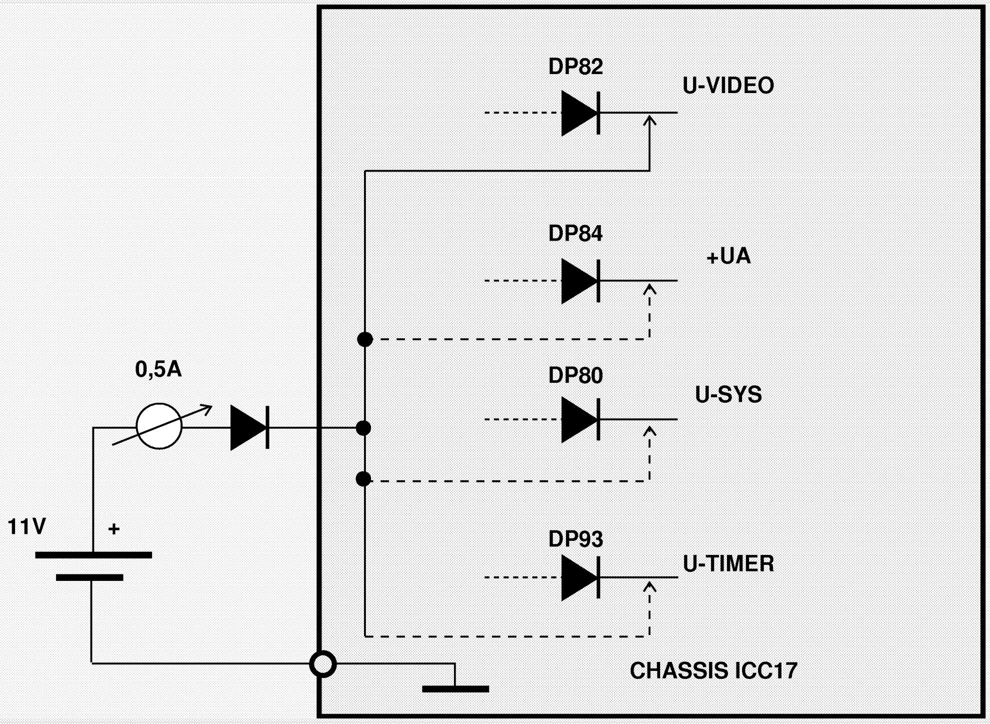
CÓDIGO	DEFECTO
12	AUDIO-DPL NO RESPONDE
14	TDA8855H NO RESPONDE
15	PROCESADOR AUDIO-MSP NO RESPONDE
19	SINTONIZADOR NO RESPONDE
21	LÍNEA SDA PUESTA A NIVEL BAJO
23	CLOCK FORZADO A NIVEL BAJO, LÍNEA SCL FORZADA A NIVEL BAJO
25	LOS 5V CONMUTADOS, FALTAN
26	EL TRC NO SE CALIENTA EN EL TIEMPO PREVISTO
27	EL BARRIDO HA DETECTADO PROTECCIÓN EN MÁS DE 3 OCASIONES
28	TDA DEL VERTICAL, EXCESIVA TENSIÓN DE GUARD
31	ERROR INTERNO DE SOFTWARE
32	UN TIMER-SOFTWARE HA SIDO SOLICITADO, PERO NO ESTÁ DISPONIBLE
34	LA "NVM" NO RESPONDE
35	LOS +13V, FALTAN
36	DIRECCIÓN DE LA NVRAM INCORRECTA
37	NIVEL INESPERADO EN LA LÍNEA NMI (INTERRUPT) POSIBLE CAUSA: DESCARGAS DEL TRC
38	PILA LLENA
41	BUS (LÍNEA DE DATOS) NO RECUPERABLE

SECONDARY DC-VOLTAGES

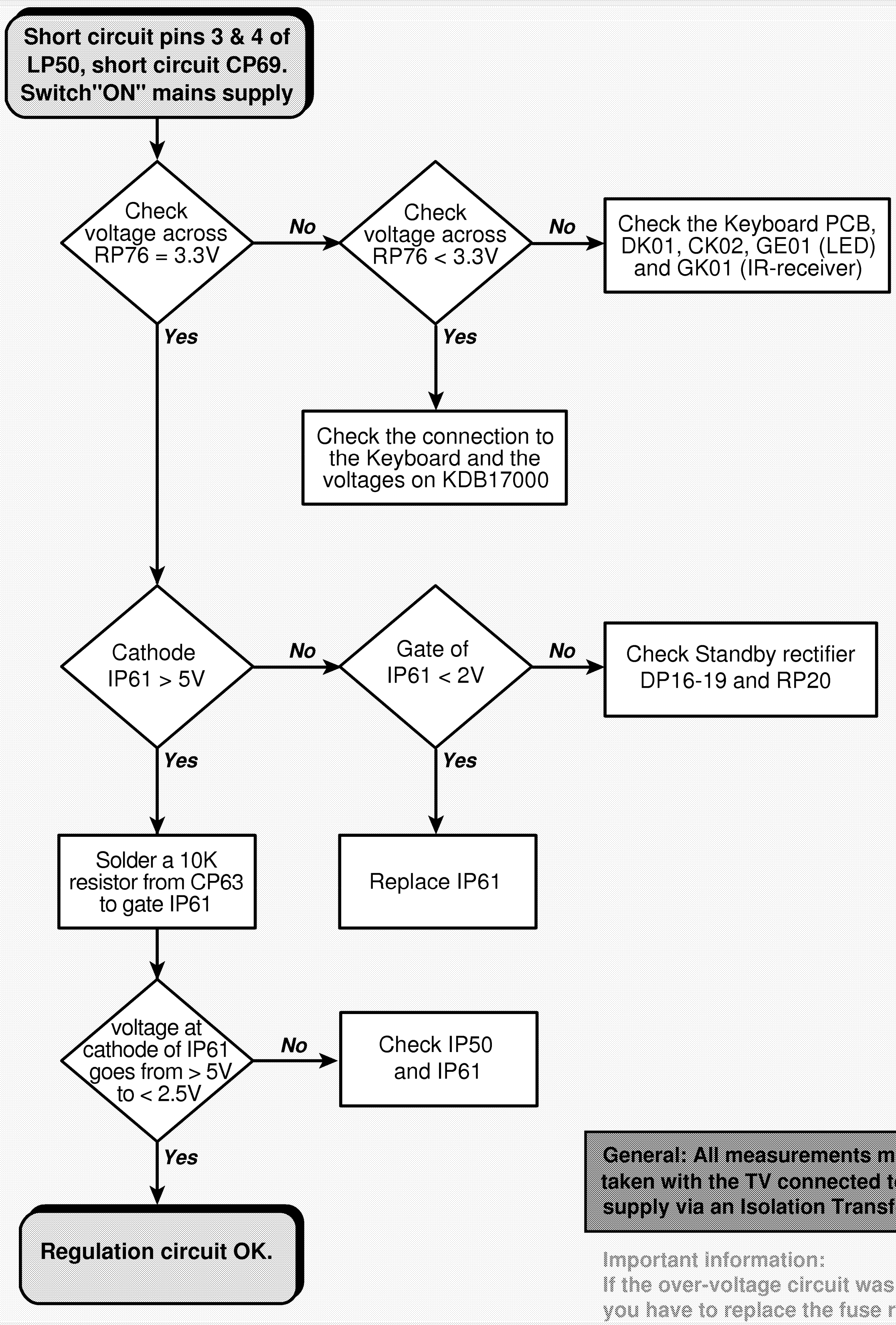
All measurements in this chapter must be done WITHOUT the mains supply connected to the TV.

Test circuit:

The external voltage source is provided by a variable DC-power supply with its output voltage set to 11V and the current limitation set to 500mA's. The negative terminal of the DC-power supply must be directly connected to the chassis secondary ground plane. The positive terminal of the DC-power supply is first connected to an ammeter and then the anode of an isolation diode. The cathode of the isolation diode is then connected to the load on the chassis as shown below. Measure the current drawn by each load tested.



STANDBY POWER SUPPLY - SECONDARY SIDE

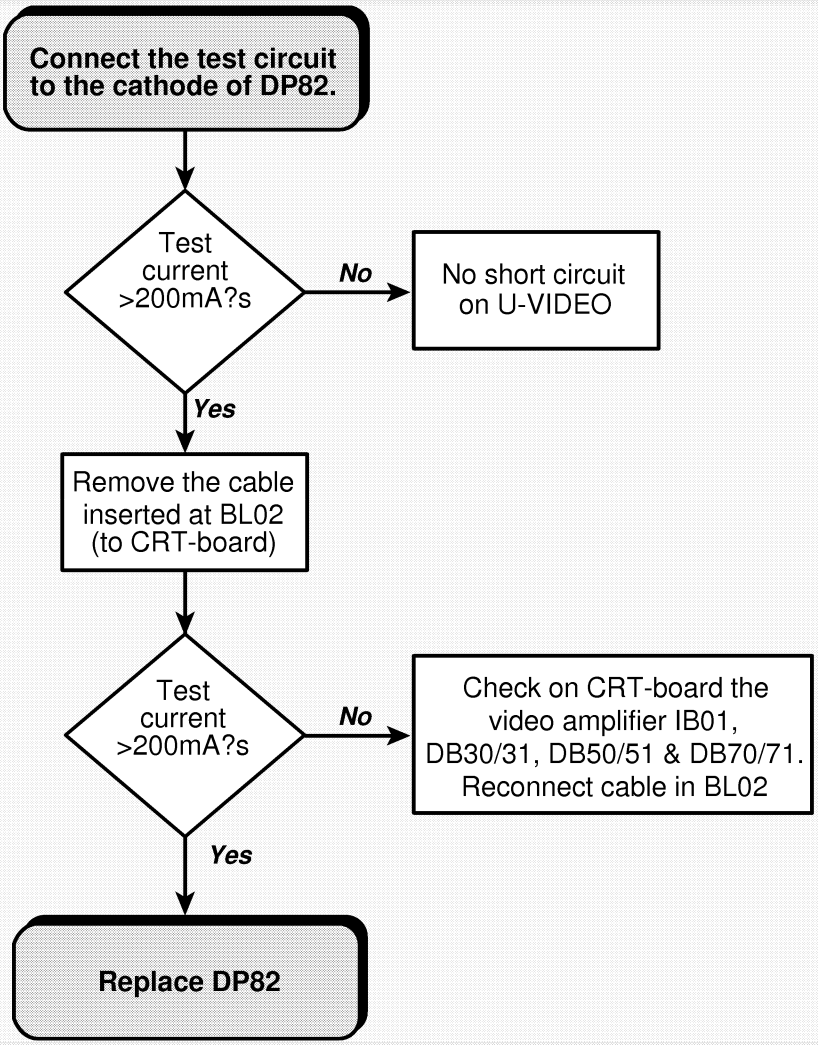

Short circuit pins 3 & 4 of LP50, short circuit CP69. Switch"ON" mains supply
Check voltage across RP76 = 3.3V
No
Check voltage across RP76 < 3.3V
No
Check the Keyboard PCB, DK01, CK02, GE01 (LED) and GK01 (IR-receiver)
Yes
Yes
Check the connection to the Keyboard and the voltages on KDB17000
Cathode IP61 > 5V
No
Gate of IP61 < 2V
No
Check Standby rectifier DP16-19 and RP20
Yes
Yes
Solder a 10K resistor from CP63 to gate IP61
Replace IP61
voltage at cathode of IP61 goes from > 5V to < 2.5V
No
Check IP50 and IP61
Yes
Regulation circuit OK.

After finishing this test, please remove the short circuits from pins 3/4 of LP50 and CP69 also remove the 10k resistor.

General: All measurements must be taken with the TV connected to the mains supply via an Isolation Transformer.

Important information:
If the over-voltage circuit was activated, you have to replace the fuse resistor at location RB/LB06 on the CRT-board.

POWER SUPPLY - SECONDARY SIDE : U-VIDEO

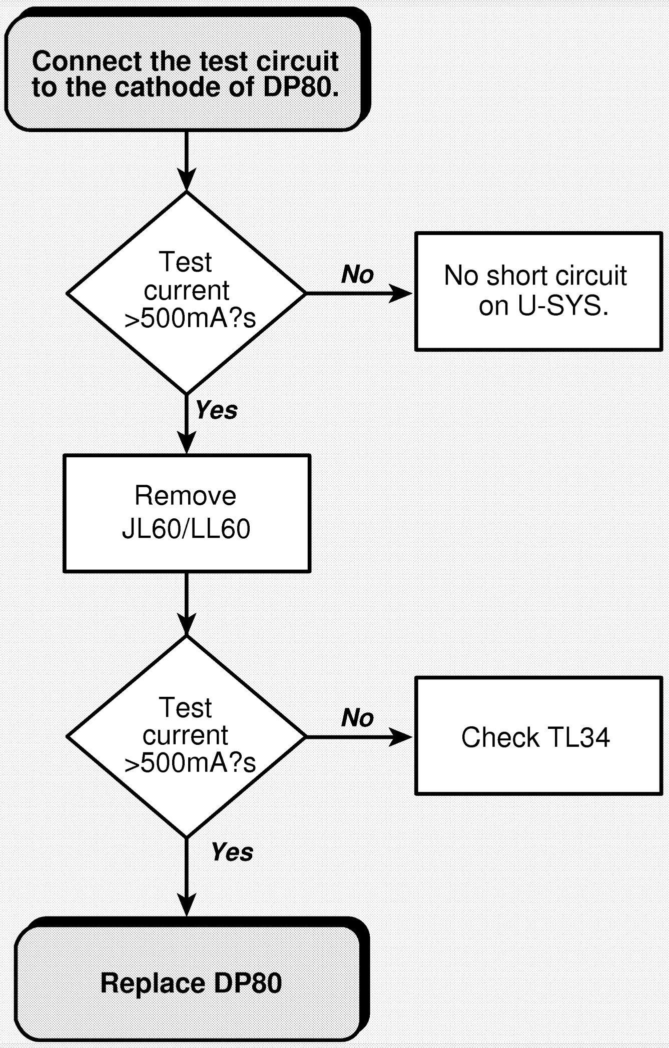

Connect the test circuit to the cathode of DP82.
Test current >200mA?s
No
No short circuit on U-VIDEO
Yes
Remove the cable inserted at BL02 (to CRT-board)
Test current >200mA?s
No
Check on CRT-board the video amplifier IB01, DB30/31, DB50/51 & DB70/71. Reconnect cable in BL02
Yes
Replace DP82

After finishing this test, please replace cable BL02 and remove the test circuit.

General: All measurements must be taken with the TV connected to the mains supply via an Isolation Transformer.

**Important information:
If the over-voltage circuit was activated, you have to replace the fuse resistor at location RB/LB06 on the CRT-board.**

POWER SUPPLY - SECONDARY SIDE : U-SYS

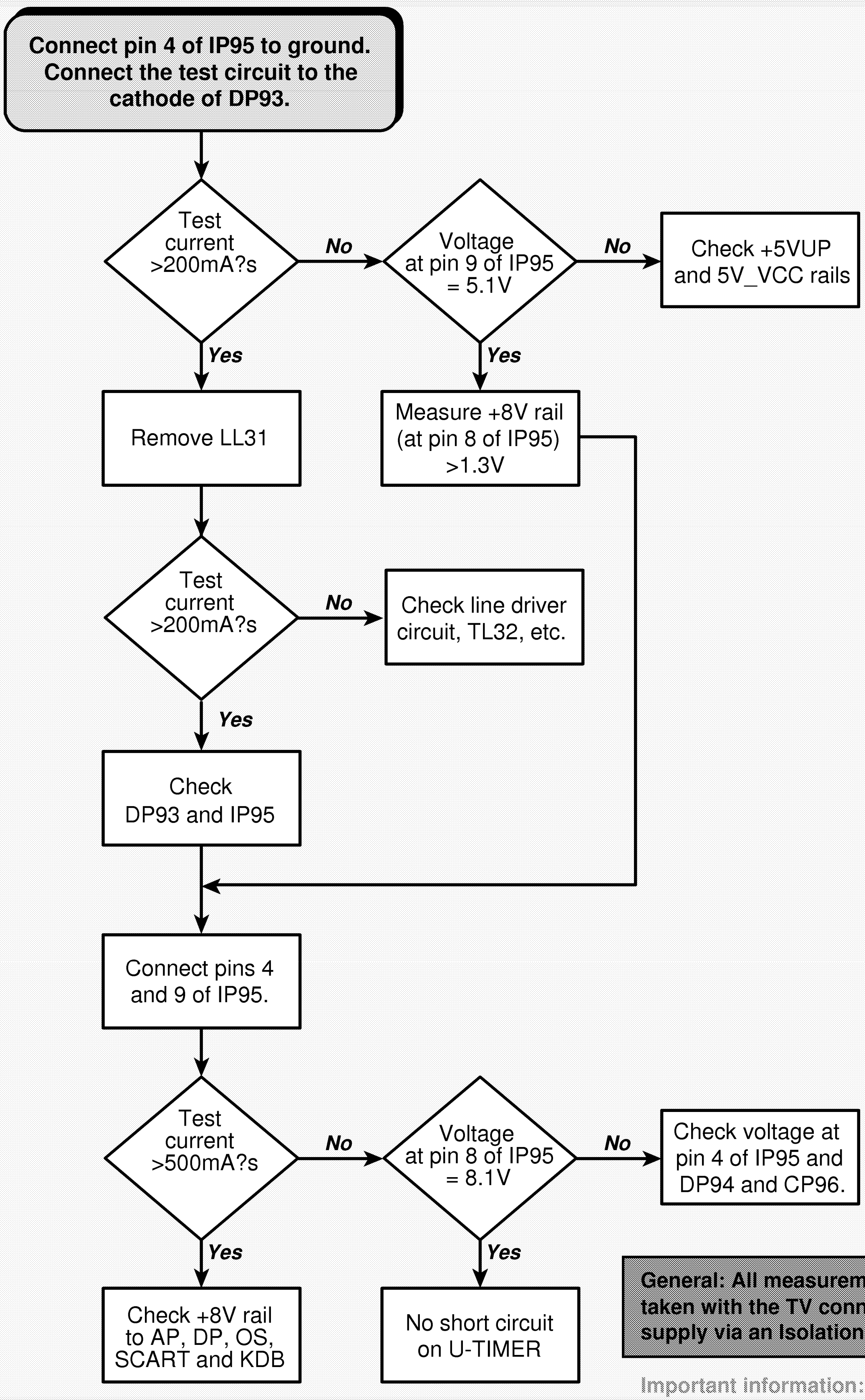

Connect the test circuit to the cathode of DP80.
Test current >500mA?s
No
No short circuit on U-SYS.
Yes
Remove JL60/LL60
Test current >500mA?s
No
Check TL34
Yes
Replace DP80

After finishing this test, please replace JL60/LL60 and remove the test circuit.

General: All measurements must be taken with the TV connected to the mains supply via an Isolation Transformer.

Important information:
If the over-voltage circuit was activated, you have to replace the fuse resistor at location RB/LB06 on the CRT-board.

POWER SUPPLY - SECONDARY SIDE : U-TIMER

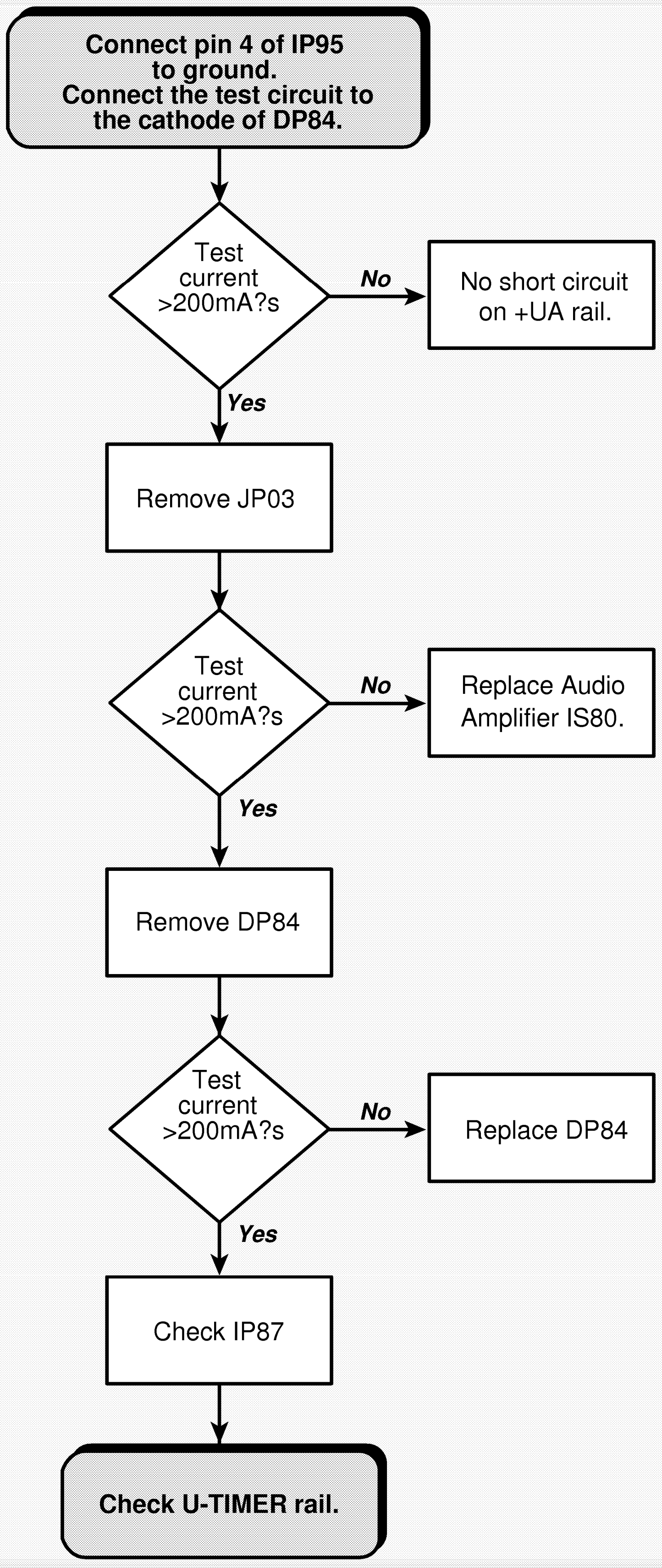

Connect pin 4 of IP95 to ground. Connect the test circuit to the cathode of DP93.
Test current >200mA?s
No
Voltage at pin 9 of IP95 = 5.1V
No
Check +5VUP and 5V_VCC rails
Yes
Yes
Remove LL31
Measure +8V rail (at pin 8 of IP95) >1.3V
Test current >200mA?s
No
Check line driver circuit, TL32, etc.
Yes
Check DP93 and IP95
Connect pins 4 and 9 of IP95.
Test current >500mA?s
No
Voltage at pin 8 of IP95 = 8.1V
No
Check voltage at pin 4 of IP95 and DP94 and CP96.
Yes
Yes
Check +8V rail to AP, DP, OS, SCART and KDB
No short circuit on U-TIMER

After finishing this test, please replace LL31, remove the link between pins 4 and 9 of IP95 and remove the test circuit.

General: All measurements must be taken with the TV connected to the mains supply via an Isolation Transformer.

Important information:
If the over-voltage circuit was activated, you have to replace the fuse resistor at location RB/LB06 on the CRT-board.

POWER SUPPLY - SECONDARY SIDE : +UA


Connect pin 4 of IP95 to ground. Connect the test circuit to the cathode of DP84.
Test current >200mA?s
No
No short circuit on +UA rail.
Yes
Remove JP03
Test current >200mA?s
No
Replace Audio Amplifier IS80.
Yes
Remove DP84
Test current >200mA?s
No
Replace DP84
Yes
Check IP87
Check U-TIMER rail.

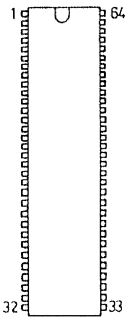
General: All measurements must be taken with the TV connected to the mains supply via an Isolation Transformer.

Important information:
If the over-voltage circuit was activated, you have to replace the fuse resistor at location RB/LB06 on the CRT-board.

LIST OF ABBREVIATIONS - LISTE DES ABREVIATIONS- ABKÜRZUNGEN
LISTA DELLE ABBREVIAZIONI - LISTA DE ABREVIACIONES

+USYS:	System voltage
+U_VIDEO:	Video drive voltage for the CRT board
+ STDBY_ ON:	Standby data (0V standby , 0.6v switched ON)
+5V DST:	5v unregulated voltage from the DST to supply the tuner and audio MSP device
+5V ON:	5v regulated voltage from the DST to supply the tuner and audio MSP device
+5V UP :	Microprocessor supply voltage
BCL:	Beam current limiting information
CVBS:	Composite video / luminance signal
CVBS_OUT:	Composite video output
CVBS_TXT:	Composite video for teletext extraction
DEGAUSS:	Degauss signal
EW :	East / West
FORMAT / BC:	Full white control DATA depending on 16/9 selected format
HDRV:	Horizontal deflection signal
HTR1 / HTR2:	Heater voltage from the DST to CRT PCB
LFB:	Line Fast Blanking
MUTE :	Mutes audio amplifiers
PO:	“Power ON “ IP95 : reset activated and output = 8v “PO” = 5v when TV is working in normally
POWER_FAIL:	Detection of mains supply and deflection stage failures
RESET:	Microprocessor reset signal
SAFETY:	Safety information from the deflection stage
SCL:	Serial Clock
SDA :	Serial Data
SIF:	Sound IF
TRAP_INFO:	31.4Mhz IF trap activation
U_ STANDBY:	Standby voltage
U_DRIVER:	Horizontal sync signal from TDA8855H
U_TIMER:	11v voltage used during “Switch ON “ phase and “Wake Up“ mode
V FLB:	Vertical flyback reference for the microprocessor
V GUARD:	Safety data generated by the vertical amplifier TDA 8351
V_RETRACE:	42 / 48volts (depending on tube type) generated by the DST and used for vertical blanking
V_SUPPLY:	13.5 to 15.5 volts (depending on tube type) generated by the DST

INTEGRATED CIRCUITS AND TRANSISTORS OUTLINE -
CIRCUITS INTEGRES ET TRANSISTORS
INTEGRIERTE SCHALTUNGEN UND TRANSISTOREN -
CIRCUITI INTEGRATI TRANSISTOR
CIRCUITOS INTEGRADOS Y TRANSISTORES



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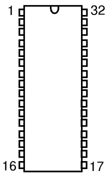

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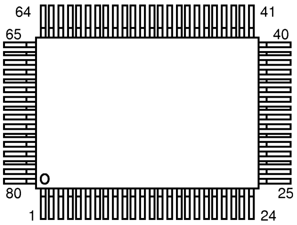
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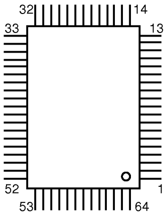
ST92R195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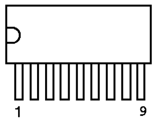
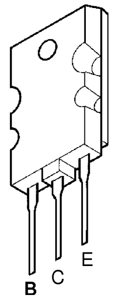
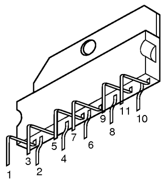
TDA8855H



TDA8351



BUH516TH16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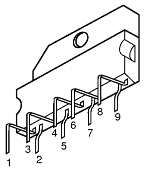
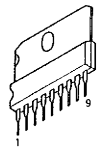
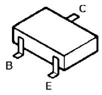
TDA7269



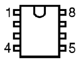
TDA6107Q



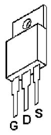
TDA 8139



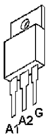
BC 847B
BC 857B
BCR141
BCR191
DTC113ZK
DTC144EK
TN1401



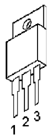
ST24C08-M
TS3702CD



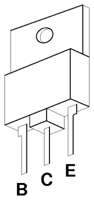
STP6 NA60F1



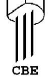
BT806 -600C



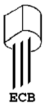
MC7812/CT



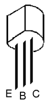
BD241C



BC 337
BC 546B
BC 547B



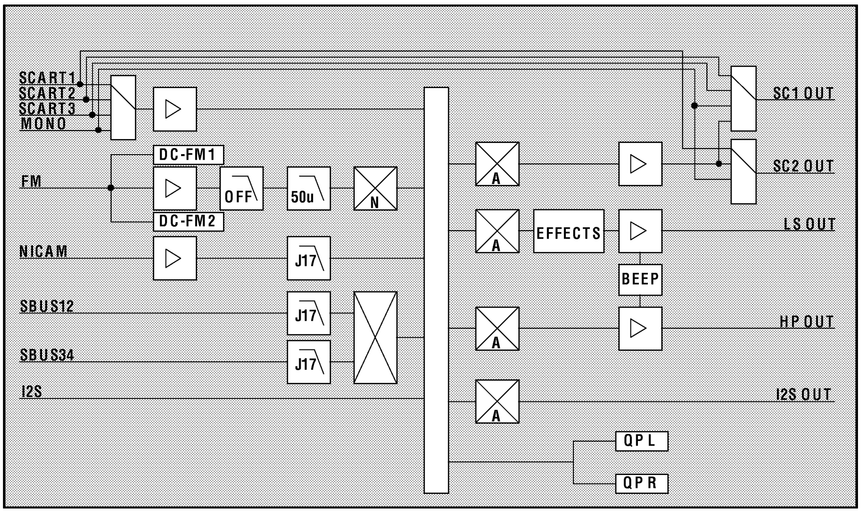
BF 422
BF423
2SA1020Y
2SC2236Y

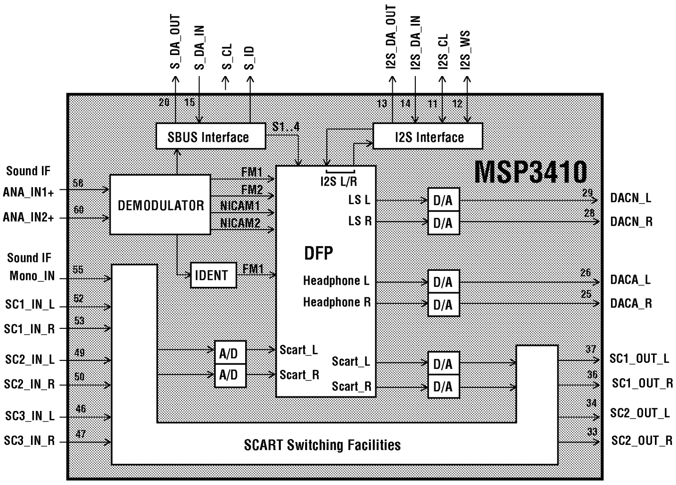


MPS750

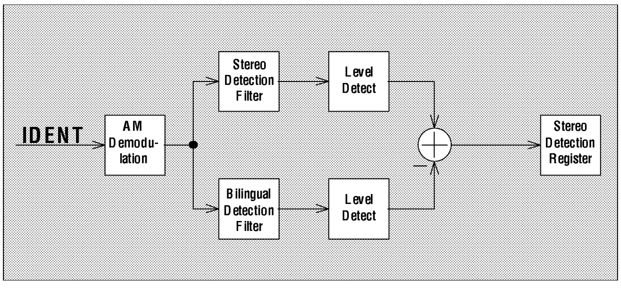
INTEGRATED CIRCUITS BLOCK DIAGRAMS -
SYNOPTIQUES INTERNES DES CIRCUITS INTEGRES -
INTEGRIERTE SCHALTUNGEN BLOCKSCHALTBILDER
SCHEMA A BLOCCHI DEI CIRCUITI INTEGRATI -
VISTA INTERNA DE LOS CIRCUITOS INTEGRADOS

Audio baseband processing of the MSP3410

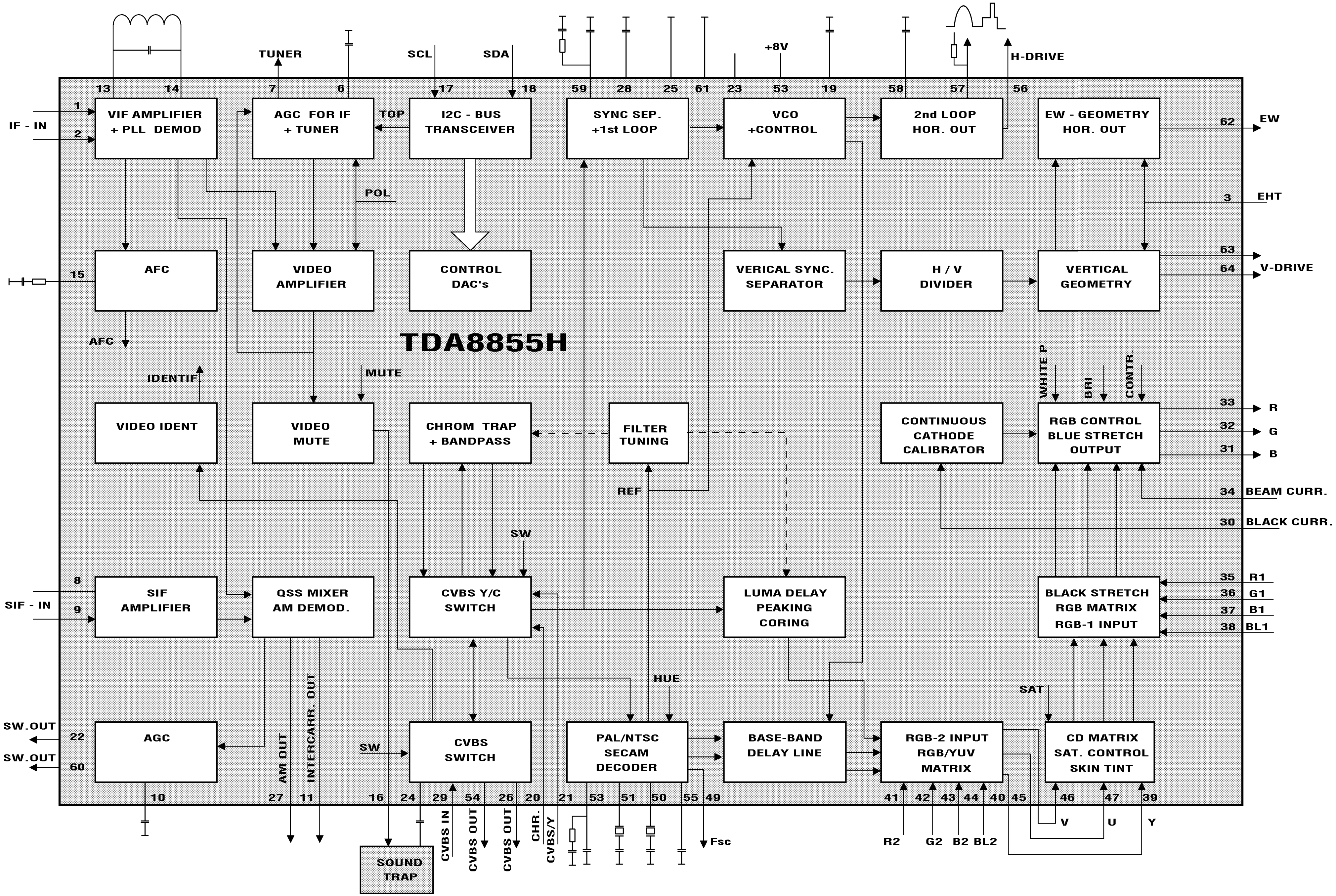

SCART1
SCART2
SCART3
MONO
FM
DC-FM1
DC-FM2
OFF
50u
N
NICAM
J17
SBUS12
SBUS34
I2S
A
EFFECTS
BEEP
SC1 OUT
SC2 OUT
LS OUT
HP OUT
I2S OUT
QPL
QPR


S_DA_OUT
S_DA_IN
S_CL
S_ID
I2S_DA_OUT
I2S_DA_IN
I2S_CL
I2S_WS
20
15
13
14
11
12
SBUS Interface
S1..4
I2S Interface
MSP3410
I2S L/R
Sound IF
ANA_IN1+
ANA_IN2+
58
60
DEMODULATOR
FM1
FM2
NICAM1
NICAM2
DFP
LS L
LS R
D/A
DACN_L
DACN_R
29
28
Sound IF
Mono_IN
55
IDENT
FM1
Headphone L
Headphone R
DACA_L
DACA_R
26
25
SC1_IN_L
SC1_IN_R
52
53
SC2_IN_L
SC2_IN_R
49
50
A/D
Scart_L
Scart_R
SC1_OUT_L
SC1_OUT_R
37
36
SC3_IN_L
SC3_IN_R
46
47
SCART Switching Facilities
SC2_OUT_L
SC2_OUT_R
34
33

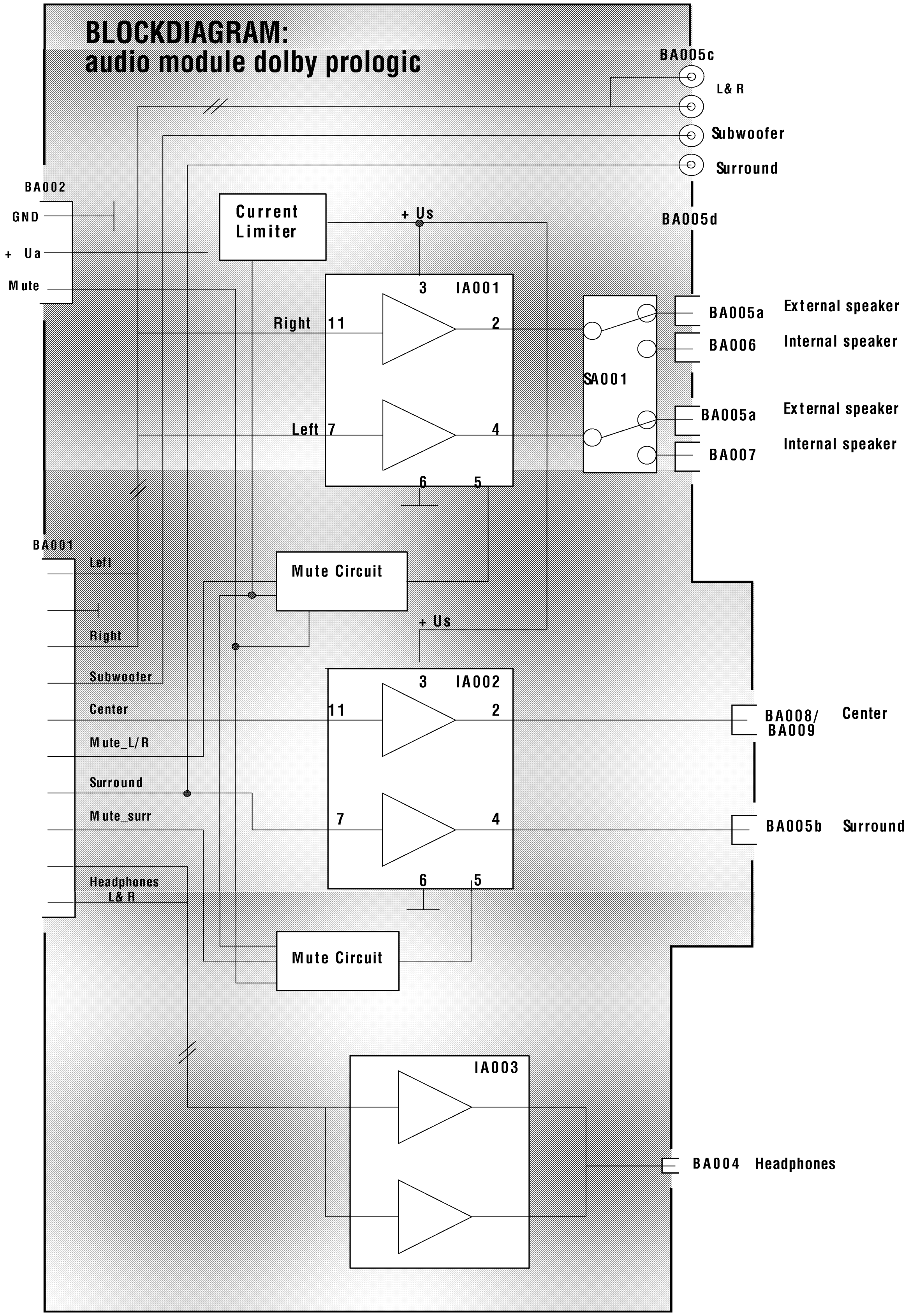
Detection part of the MSP 3410


IDENT
AM Demodulation
Stereo Detection Filter
Bilingual Detection Filter
Level Detect
Level Detect
+
−
Stereo Detection Register

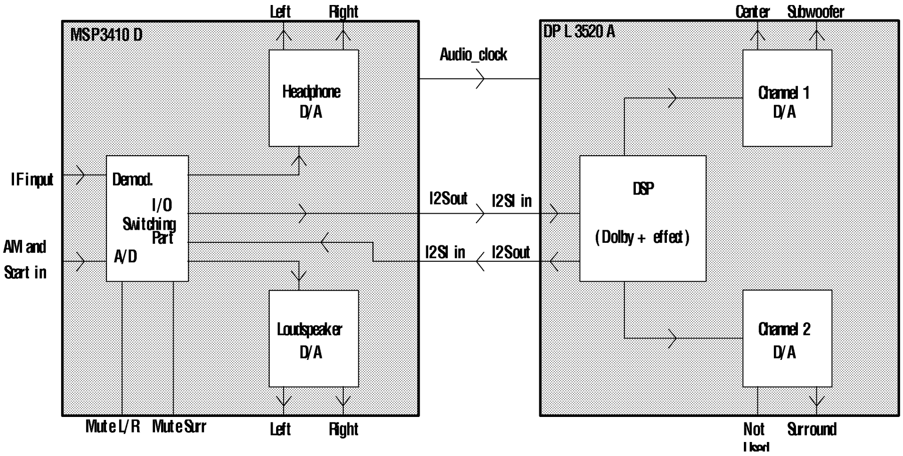
IV01 TDA 8855H


TDA8855H
IF - IN
1
2
13
14
VIF AMPLIFIER + PLL DEMOD
TUNER
7
6
AGC FOR IF + TUNER
TOP
SCL
17
SDA
18
I2C - BUS TRANSCEIVER
59
28
25
61
23
SYNC SEP. +1st LOOP
+8V
53
19
VCO +CONTROL
58
57
56
2nd LOOP HOR. OUT
H-DRIVE
EW - GEOMETRY HOR. OUT
62
EW
POL
3
EHT
15
AFC
VIDEO AMPLIFIER
CONTROL DAC's
VERICAL SYNC. SEPARATOR
H / V DIVIDER
VERTICAL GEOMETRY
63
64
V-DRIVE
AFC
IDENTIF.
MUTE
WHITE P
BRI
CONTR.
33
R
32
G
31
B
VIDEO IDENT
VIDEO MUTE
CHROM TRAP + BANDPASS
FILTER TUNING
CONTINUOUS CATHODE CALIBRATOR
RGB CONTROL BLUE STRETCH OUTPUT
REF
34
BEAM CURR.
30
BLACK CURR.
SW
8
SIF - IN
9
SIF AMPLIFIER
QSS MIXER AM DEMOD.
CVBS Y/C SWITCH
LUMA DELAY PEAKING CORING
35
R1
36
G1
37
B1
38
BL1
BLACK STRETCH RGB MATRIX RGB-1 INPUT
HUE
SAT
SW.OUT
22
SW.OUT
60
AGC
AM OUT
INTERCARR. OUT
SW
CVBS SWITCH
PAL/NTSC SECAM DECODER
BASE-BAND DELAY LINE
RGB-2 INPUT RGB/YUV MATRIX
CD MATRIX SAT. CONTROL SKIN TINT
10
27
11
16
24
29
54
26
20
21
53
51
50
55
49
41
42
43
44
40
45
46
47
39
SOUND TRAP
CVBS IN
CVBS OUT
CVBS OUT
CHR.
CVBS/Y
Fsc
R2
G2
B2
BL2
V
U
Y

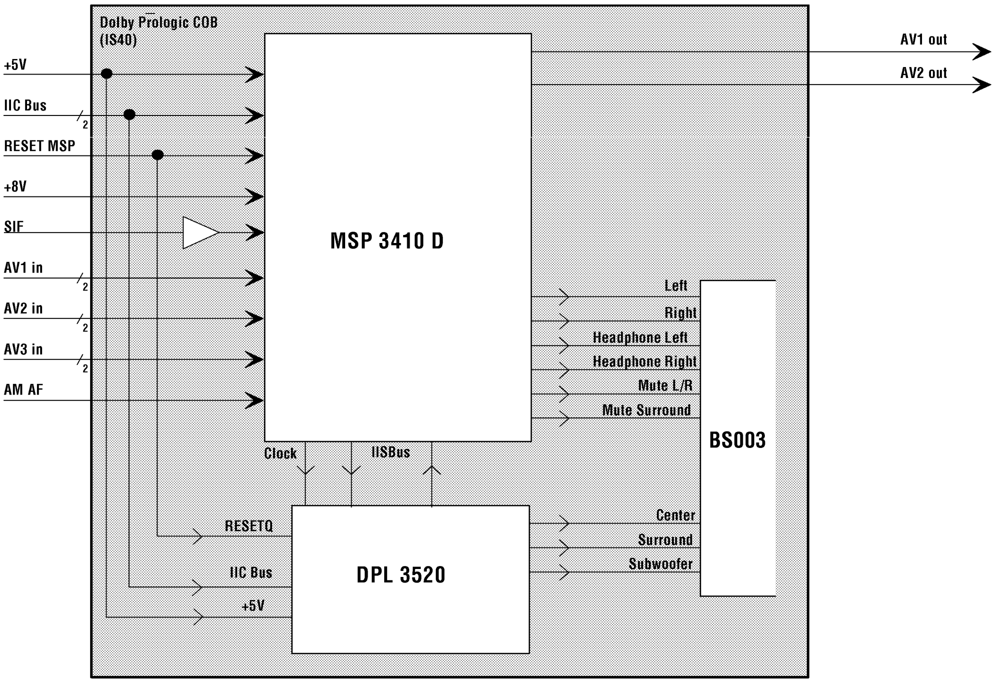
BLOCK DIAGRAM (AUDIO MODULE DOLBY PROLOGIC)
SCHEMA SYNOPTIQUE (AUDIO MODULE DOLBY PROLOGIC)
BLOCKSCHALTBILD (AUDIO MODULE DOLBY PROLOGIC)
SCHEMA A BLOCCI (AUDIO MODULE DOLBY PROLOGIC)
ESQUEMA DE BLOQUES (AUDIO MODULE DOLBY PROLOGIC)


BLOCKDIAGRAM:
audio module dolby prologic
BA005c
L& R
Subwoofer
Surround
BA002
GND
+ Ua
Mute
Current Limiter
+ Us
BA005d
3
IA001
Right
11
2
Left
7
4
6
5
BA005a
External speaker
BA006
Internal speaker
SA001
BA005a
External speaker
BA007
Internal speaker
BA001
Left
Right
Subwoofer
Center
Mute_L/R
Surround
Mute_surr
Headphones
L& R
Mute Circuit
+ Us
3
IA002
11
2
7
4
6
5
BA008/
BA009
Center
BA005b
Surround
Mute Circuit
IA003
BA004
Headphones

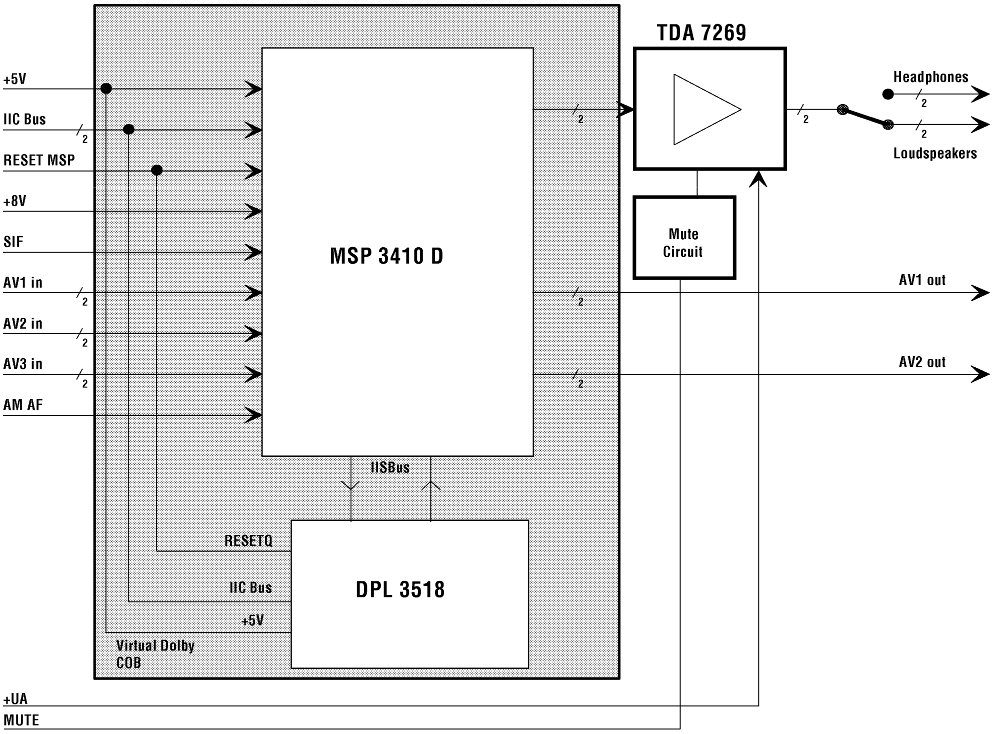
Interface requirement audio part with Dolby Prologic


MSP3410 D
Left
Right
Headphone D/A
IF input
AM and Scart in
Demod.
I/O Switching Part
A/D
Loudspeaker D/A
Mute L/R
Mute Surr
Left
Right
Audio_clock
I2Sout
I2SI in
I2SI in
I2Sout
DP L 3520 A
Center
Subwoofer
Channel 1 D/A
DSP
(Dolby + effect)
Channel 2 D/A
Not Used
Surround

Block diagram Dolby Prologic


Dolby Prologic COB (IS40)
+5V
IIC Bus
2
RESET MSP
+8V
SIF
AV1 in
2
AV2 in
2
AV3 in
2
AM AF
MSP 3410 D
AV1 out
AV2 out
Left
Right
Headphone Left
Headphone Right
Mute L/R
Mute Surround
BS003
Clock
IISBus
RESETQ
IIC Bus
+5V
DPL 3520
Center
Surround
Subwoofer

Block diagram Virtual Dolby


+5V
IIC Bus
2
RESET MSP
+8V
SIF
AV1 in
2
AV2 in
2
AV3 in
2
AM AF
MSP 3410 D
2
2
2
TDA 7269
2
Headphones
2
2
Loudspeakers
Mute Circuit
AV1 out
AV2 out
IISBus
RESETQ
IIC Bus
+5V
DPL 3518
Virtual Dolby COB
+UA
MUTE

CÓDIGO DE CONDICIÓN | CÓDIGO DE SÍNTOMA PRINCIPAL → CÓDIGO DE SÍNTOMA EXTENDIDO (*1)

SISTEMA DE LOS CÓDIGOS DE REPARACIÓN EACEM-IRIS

TABLA DE LOS CÓDIGOS DE SÍNTOMA

EACEM IRIS

1	CONSTANTE
2	INTERMITENTE
3	DESPUÉS DE ALGÚN TIEMPO
4	CALIENTE
5	FRÍO
6	DURANTE LA CONEXIÓN
7	BAJO VIBRACIÓN
8	EN AMBIENTE HÚMEDO/ MOJADO/ LLUVIOSO/ NEVADO
9	SECO
A	DESPUÉS DE UNA CAÍDA/DAÑO EN EL TRANSPORTE
B	DESPUÉS DE RELÁMPAGO
C	SOLAMENTE ALGUNAS ESTACIONES/ SOFTWARE/ MODO/CANALES/ BANDA DE FRECUENCIA/ RED(ES)
D	SOLAMENTE ALGUNOS ESTANDARDS
E	SOLAMENTE UN CANAL
F	SOLAMENTE ALGUNAS ENTRADAS
G	SOLAMENTE ALGUNAS SALIDAS
H	EN MODO STANDBY/OFF
J	EN PUNTO DE EDICIÓN
K	INTER-CONECTADO CON OTROS APARATOS
L	CONTAMINACIÓN LÍQUIDA
M	BREVEMENTE DESPUÉS DE LA CONEXIÓN
N	DESPUÉS DE EFECTUAR UNA COPIA
O	BAJO CONDICIONES DE ESFUERZO/ALTA CARGA
P	DESCONECTADO

		1 INACTIVO	2 NIVEL	3 CALIDAD	4 RUIDO
1	GENERAL	**110 PROBLEMA DE ALIMENTACIÓN O NO FUNCIONA** 111 NO HAY ALIMENTACIÓN 112 NO HAY ALIMENTACIÓN CON ADAPTADOR DE C.A. 113 NO HAY ALIMENTACIÓN CON BATERÍAS SECAS 114 NO HAY ALIMENTACIÓN CON BATERÍAS RECARGABLES 115 NO HAY ALIMENTACIÓN CON BATERÍAS SOLAR 116 NO HAY ALIMENTACIÓN CON BATERÍAS COCHE 117 CORTA DURACIÓN DE FUNCIONAMIENTO/DE BATERÍA 118 NO HAY DESCONEXIÓN 119 NO HAY CONEXIÓN DE STANDBY 11A SOLAMENTE HAY ALIMENTACIÓN (NO OPERA) 11B CONEXIÓN/DESCONEXIÓN CÍCLICA 11C FUSIBLE EXTERNO (PRINCIPAL) FUNDIDO 11D EL APARATO SE DESCONECTA SOLO 11E PROBLEMA BATERÍA DE MANTENIMIENTO 11F NO FUNCIONA 11G NO HAY CONMUTACIÓN ON/OFF AUTOMÁTICA 11H SE DISPARA FUSIBLE INTERNO/INTERRUPTOR DE PROTECCIÓN 11J NO RECONOCE LA BATERÍA RECARGABLE 11X OTRO PROBLEMA DE ALIMENTACIÓN	**120 PROBLEMA DE CARGA** 121 NO HAY CARGA DE BATERÍA 122 CARGA INCOMPLETA DE BATERÍA 123 TIEMPO DE CARGA MUY LARGO 12X OTRO PROBLEMA DE CARGA	**130 PROBLEMA DE LA INDICACIÓN** 131 FALLO EN EL INDICADOR 132 FALLO EN LA OPERACIÓN DE LA LAMPADA/LED 133 FALLO EN LA OPERACIÓN DEL MEDIDOR DE NIVEL 134 FALLO EN LA OPERACIÓN DE LA INDICACIÓN 135 FALLO EN LA INDICACIÓN DE LA SINTONÍA ELECTRÓNICA 136 FALLO EN LA INDICACIÓN DE LA SINTONÍA MECÁNICA 137 FALLO EN LA INDICACIÓN DEL CÓDIGO DE TIEMPO 138 FALLO EN LA INDICACIÓN DE ALARM/ERROR 139 DISPLAY BORROSO/DEMASIADO OSCURO 13A MENSAJE EN EL DISPLAY INCORRECTO 13B NO FUNCIONA LUZ INTERNA 13C 'NO INDICACIÓN DE "BEEPS"' 13D NO FUNCIONA LA LUZ DE PRECAUCIÓN 13E LA LUZ DE PRECAUCIÓN SE ILUMINA 13X OTRO PROBLEMA DE LA INDICACIÓN	**140 RUIDO ANORMAL** 141 RUIDO DE DESCARGA DEL TUBO CATÓDICO 142 RUIDO DE DESCARGA DEL BLOQUE DE ALTA TENSIÓN 143 MUEBLE RUIDOSO/BANDEJA CRUJIENTE 144 TRANSFORMADOR RUIDOSO/ZUMBIDO 145 COMPONENTE(S) PERTURBADOR(ES) 146 VIBRACIÓN 147 CHASQUIDO 148 RUIDO DE RELOJ 149 CRUJIDO 14A SILBIDO 14X OTRO PROBLEMA DE RUIDO ANORMAL
2	COMUNICACIÓN	**210 NO HAY RECEPCIÓN O CONEXIÓN** 211 NO HAY RECEPCIÓN AM 212 NO HAY RECEPCIÓN FM 213 NO HAY RECEPCIÓN SW 214 NO HAY RECEPCIÓN VHF 215 NO HAY RECEPCIÓN UHF 216 NO HAY RECEPCIÓN SHF 217 NO HAY RECEPCIÓN CS 218 NO HAY RECEPCIÓN HDTV 219 NO HAY RECEPCIÓN GPS/QPS 21A NO HAY RECEPCIÓN DE EMISORAS DIGITALES 21B NO HAY RECEPCIÓN IR 21C NO HAY SINTONÍA CON EL DIAL 21D NO HAY CONEXIÓN MODEM/FAX 21E MODEM NO CONTESTA/NO HAY PORTADORA 21F NO HAY CONEXIÓN MODEM/FAX 21X OTRO PROBLEMA DE 'NO HAY RECEPCIÓN'	**220 NIVEL DE RECEPCIÓN O CONEXIÓN DÉBIL** 221 RECEPCIÓN AM DÉBIL 222 RECEPCIÓN FM DÉBIL 223 RECEPCIÓN SW DÉBIL 224 RECEPCIÓN VHF DÉBIL 225 RECEPCIÓN UHF DÉBIL 226 RECEPCIÓN SHF DÉBIL 227 RECEPCIÓN POBRE CS 228 RECEPCIÓN POBRE HDTV 229 RECEPCIÓN POBRE GPS/QFS 22A RECEPCIÓN POBRE DE EMISIÓN DIGITAL 22B RECEPCIÓN POBRE IR 22X OTRO PROBLEMA DEL NIVEL DE RECEPCIÓN DÉBIL	**230 PROBLEMA DE TRANSMISIÓN/CONEXIÓN** 231 NO HAY TRANSMISIÓN/CONEXIÓN 232 TRANSMISIÓN/CONEXIÓN DÉBIL 233 NIVEL DE TRANSMISIÓN EXCESIVO 234 NO HAY TRANSMISIÓN ENTRE LA UNIDAD DE BASE Y LA UNIDAD PORTÁTIL 235 COMUNICACIÓN DEBIL ENTRE LA UNIDAD DE BASE Y LA UNIDAD PORTÁTIL 236 NO HAY TRANSMISIÓN IR 237 CONEXIÓN DE UNA CARA 238 MODEM SE CUELGA INMEDIATAMENTE AL CONECTARSE 239 MODEM PIERDE LA LÍNEA DURANTE LA CONEXIÓN 23X OTRO PROBLEMA DE TRANSMISIÓN/CONEXIÓN	**240 COMUNICACIÓN RUIDOSA** 241 RUIDOS DE LÍNEA 242 OSCILACIÓN 243 INTERFERENCIA ENTRE ESTACIONES 24X OTRO PROBLEMA DE COMUNICACIÓN RUIDOSA
3	IMAGEN	**310 NO HAY IMAGEN** 311 NO HAY IMAGEN EN EL MODO EE 312 NO HAY IMAGEN EN LA REPRODUCCIÓN 313 NO HAY IMAGEN EN EL VISOR 314 NO HAY IMAGEN/SOLO TRAMA 315 PANTALLA NEGRA 316 SÓLO LÍNEA HORIZONTAL 317 SÓLO LÍNEA VERTICAL 318 NO HAY IMAGEN EN EL LCD 319 NO HAY INDICACIÓN DE 2º MONITOR (U OTRO) 31X OTRO PROBLEMA DE NO HAY IMAGEN	**320 PROBLEMA DEL NIVEL DE IMAGEN** 321 IMAGEN DEMASIADO OBSCURA 322 IMAGEN DEMASIADO CLARA 323 CONTRASTE DÉBIL 324 CONTRASTE ALTO 325 SATURACIÓN DEL NIVEL DEL BLANCO O DEL NEGRO 326 SOMBRA EN LA IMAGEN 327 SOLO PARTE DE LA IMAGEN 32X OTRO PROBLEMA DEL NIVEL DE IMAGEN	**330 PROBLEMA DE LA CALIDAD DE IMAGEN** 331 RESOLUCIÓN DÉBIL DE LA IMAGEN 332 ENFOQUE ERRÓNEO 333 OSCILACIÓN TRANSITORIA EN LA IMAGEN 334 BORROSIDAD/RETARDO 335 FALLO DE LINEALIDAD O GEOMETRÍA 336 DIMENSIÓN ERRÓNEA 337 CENTRADO ERRÓNEO DE LA IMAGEN 338 IMAGEN INCLINADA 339 INCORRECTO TAMAÑO V 33A INCORRECTO TAMAÑO H 33X OTRO PROBLEMA DE LA CALIDAD DE IMAGEN	**340 IMAGEN RUIDOSA** 341 NIEVE EN LA IMAGEN 342 RUIDO DE PUNTOS/PÉRDIDAS EN LA IMAGEN 343 BARRAS DE RUIDO EN LA IMAGEN 344 LÍNEAS DE BORRADO EN LA IMAGEN 345 BATIDO EN LA IMAGEN 346 HALOS EN LA IMAGEN 347 RUIDO DE CONMUTACIÓN DE CABEZAS EN LA IMAGEN 348 RUIDO DE SOBREMODULACIÓN 349 MOIRÉ 34A RUIDO EN MOSAICO 34B IMAGEN DIFICULTOSA 34X OTRO PROBLEMA DE IMAGEN RUIDOSA
4	COLOR	**410 NO HAY COLOR** 411 NO HAY COLOR EN EL MODO EE 412 NO HAY COLOR EN LA REPRODUCCIÓN 413 NO HAY COLOR EN EL VISOR 414 NO HAY COLOR EN PARTE DE LA IMAGEN 41X OTRO PROBLEMA DE NO HAY COLOR	**420 PROBLEMA DEL NIVEL DE COLOR** 421 COLOR DÉBIL 422 COLOR EXCESIVO/SATURADO 42X OTRO PROBLEMA DEL NIVEL DE COLOR	**430 PROBLEMA DE LA CALIDAD DE COLOR** 431 PÉRDIDA DE UNO O DOS COLORES 432 FALLO DEL BALANCE DE BLANCO 433 PROBLEMA DEL MATIZ 434 ERROR DE PUREZA 435 ERROR DE PUREZA/BLANCO UNIFORME 436 ERROR DE CONVERGENCIA 437 REGISTRO DE COLOR ERRÓNEO 438 MOARÉ EN LA IMAGEN/PATRÓN DE ARCO IRIS 439 DESPLAZAMIENTO DEL COLOR 43X OTRO PROBLEMA DE LA CALIDAD DE COLOR	**440 COLOR RUIDOSO** 441 COLOR RUIDOSO EN BLANCO Y NEGRO 442 RAYAS DE COLOR 443 BARRAS DE COLOR EN PANTALLA 44X OTRO PROBLEMA DE COLOR RUIDOSO
5	SONIDO	**510 NO HAY SONIDO** 511 NO HAY SONIDO EN EL MODO EE 512 NO HAY REPRODUCCIÓN DE LOS MENSAJES TELEFÓNICOS 513 NO HAY REPRODUCCIÓN DE LOS MENSAJES RECIBIDOS 514 NO HAY REPRODUCCIÓN DE SONIDO 515 NO HAY SONIDO EN EL MICROTELÉFONO 516 NO HAY SONIDO EN EL ALTAVOZ 517 NO HAY SONIDO EN EL AURICULAR 518 NO HAY SONIDO EN EL MICRÓFONO 519 NO HAY SONIDO EN LA SALIDA DIGITAL 51X OTRO PROBLEMA DE NO HAY SONIDO	**520 PROBLEMA DEL NIVEL DE SONIDO** 521 NIVEL DÉBIL DEL SONIDO 522 NIVEL EXCESIVO DEL SONIDO 523 PROBLEMA DE BALANCE 524 PROBLEMA DE DESVANENCIMIENTO 525 PERMANENCIA DEL NIVEL DE AUDIO/NO HAY MUTING 52X OTRO PROBLEMA DEL NIVEL DE SONIDO	**530 PROBLEMA DE LA CALIDAD DE SONIDO** 531 RESPUESTA DE FRECUENCIA DÉBIL 532 DISTORSIÓN DEL SONIDO 533 NO HAY AGUDOS 534 NO HAY GRAVES 535 DÉBIL SONIDO EN EL AURICULAR 53X OTRO PROBLEMA DE LA CALIDAD DE SONIDO	**540 SONIDO RUIDOSO** 541 ZUMBIDO 542 SILBIDO 543 DIAFONÍA 544 ESTÁTICO/'POP'/CHASQUIDO 545 ZUMBIDO 546 RUIDO DE POTENCIÓMETRO 547 RUIDO DE ENCENDIDO 548 RUIDO SILBANTE/MULTIPISTA 549 RUIDO EN DATOS DIGITALES 54X OTRO PROBLEMA DE SONIDO RUIDOSO
6	MECÁNICA	**610 NO HAY FUNCIONAMIENTO MECÁNICO** 611 NO HAY GIRO DEL DISCO/MOTOR 612 NO HAY FWD 613 NO HAY REVERSE 614 NO HAY FF O REW 615 NO HAY CARGA 616 NO HAY EXPULSIÓN O DESCARGA 617 NO HAY PARO AUTOMÁTICO 618 NO HAY MOVIMIENTO DEL BRAZO 619 NO HAY EXPULSIÓN DEL DISCO 61A CARGA/DESCARGA DEL CARGADOR O MÓDULO 61B NO FUNCIONA INTERRUPTOR/CONTROL 61X OTRO PROBLEMA DE NO HAY FUNCIONAMIENTO MECÁNICO	**620 OPERACIÓN MECÁNICA IRREGULAR** 621 ROTACIÓN IRREGULAR 622 FWD IRREGULAR 623 REVERSE IRREGULAR 624 FF O REW IRREGULAR 625 CARGA IRREGULAR DEL SISTEMA 626 EXPULSIÓN O DESCARGA IRREGULAR 627 PARO AUTOMÁTICO IRREGULAR 628 MOVIMIENTO IRREGULAR DEL BRAZO 629 EXPULSIÓN IRREGULAR DEL DISCO 62A CAMBIO IRREGULAR DE LA DIRECCIÓN 62B FALLO EN LA OPERACIÓN DE CAMBIO DE DISCO 62X OTRO PROBLEMA DE OPERACIÓN MECÁNICA IRREGULAR	**630 PROBLEMA DE VELOCIDAD** 631 DEMASIADO RÁPIDO 632 DEMASIADO LENTO 633 VELOCIDAD INAJUSTABLE 63X OTRO PROBLEMA DE VELOCIDAD	**640 RUIDO MECÁNICO** 641 RUIDO DE ROTACIÓN/TAMBOR 642 RUIDO DE MOTOR 643 RUIDO DE VIENTO/AIRE 644 CHILLIDO 645 RUIDO DE VENTILADOR 646 ROZAMIENTO DE DISCO 647 RUIDO DE CARGA DE CINTA 648 RUIDO DE ENGRANAJE 649 RUIDO DE CONMUTACIÓN O DE CONTROL 64A RECHINAR 64B RETUMBAR 64C RUIDO VIBRANTE 64X OTRO PROBLEMA DE RUIDO MECÁNICO
7	PROCESADO DE DATOS	**710 NO HAY PROCESADO DE DATOS** 711 NO HAY PANTALLA INICIAL 712 NO HAY REINICIACIÓN/RESET DEL SISTEMA 713 NO HAY ARRANQUE DEL SISTEMA 714 MODULA ENCHUFABLE/PERIFÉRICO NO FUNCIONA 715 TECLADO NO FUNCIONA 716 NO FUNCIONA DESDE OTRA ENTRADA/SALIDA 717 NO ALMACENA DATOS 718 NO HAY CONMUNICACIÓN DE DATOS 719 MENSAJE ERRÓNEO DEL INDICADOR 71A ERROR ARRANQUE HDD 71B ERROR ARRANQUE FDD 71X OTRO PROBLEMA DE NO HAY PROCESADO DE DATOS	**720 PROCESADO DE DATOS ERRÓNEO** 721 DATOS ERRÓNEOS 722 RESET DE SISTEMA DURANTE FUNCIONAMIENTO 723 INTERRUPCIÓN DEL SISTEMA/CAÍDA/BLOQUEO 724 ERROR DEL MÓDULO ENCHUFABLE 725 FUNCIONAMIENTO ERRÓNEO DEL TECLADO 726 FUNCIONAMIENTO ERRÓNEO DESDE OTRA ENTRADA/SALIDA 727 ALMACENAMIENTO ERRÓNEO DE DATOS 728 COMUNICACIÓN DE DATOS ERRÓNEA 729 ERROR DE MEMORIA 72A 'NECESITA "SETUP" EN EL ARRANQUE' 72X OTRO PROBLEMA DE PROCESADO DE DATOS ERRÓNEO	**730 PROBLEMA DE VISUALIZACIÓN DE DATOS** 731 CARACTERES ERRÓNEOS 732 FALTAN CARACTERES EN EL DISPLAY 733 VISUALIZACIÓN DE GRÁFICOS DEFECTUOSA 734 FALLO DE CONMUTACIÓN MODO CARACTERES/GRÁFICAS 735 FALLO DEL CURSOR/PROMPT 736 COLOR ERRÓNEO EN EL DISPLAY 737 NO HAY PAGINACIÓN/SCROLL 73X OTRO PROBLEMA DE VISUALIZACIÓN DE DATOS	**740 DISPOSITIVO INDICADOR/TECLAS DE CONTACTO** 741 NO FUNCIONA MOUSE/TRACKBALL/JOYSTICK 742 TECLA BLOQUEADA 743 DISPOSITIVO INDICADOR BLOQUEADO 744 TECLA(S) PEGADA(S) 745 TECLA(S) NO OPERATIVA(S) 746 DISPOSITIVO INDICADOR NO SIGUE CORRECTAMENTE 747 DISPOSITIVO INDICADOR VIBRA 748 NO FUNCIONA CONMUTACIÓN DEL BOTÓN DERECHO O IZQUIERDO 749 PISTA DE SEGUIMIENTO DETERIORADA 74A TECLA(S) DE CONTACTO DETERIORADA(S) 74X OTRO PROBLEMA DE TECLA/DISPOSITIVO INDICADOR
8	IMPRESIÓN/COPIADO/ESCANEADO	**810 NO HAY OPERACIÓN DE IMPRESIÓN/COPIA/ESCANEO** 811 NO HAY IMPRESIÓN 812 NO HAY CONMUNICACIÓN CON LA IMPRESORA 813 NO HAY CARGA DE PAPEL 814 NO HAY ALIMENTACIÓN DE PAPEL 815 NO QUEDA FIJADA LA IMAGEN 816 NO HAY ALIMENTACIÓN DE DOCUMENTO 817 NO TRABAJA EL ESCANER 81X OTRO PROBLEMA DE 'NO HAY OPERACIÓN DE IMPRESIÓN/COPIA/ ESCANEO	**820 FUNCIÓN ERRÓNEA DE IMPRESIÓN/COPIA/ESCANEO** 821 IMAGEN INVERTIDA (NEGATIVO/POSITIVO) 822 ALIMENTACIÓN ERRÓNEA DEL PAPEL 823 CONMUTACIÓN DEL MODO DE IMPRESIÓN ERRÓNEO 824 COPIA DEMASIADO OSCURA 825 COPIA DEMASIADO CLARA 826 COPIA NEGRA 827 COPIA BLANCA 828 NIVELES DE COLOR POBRES 829 ALIMENTACIÓN IRREGULAR DE DOCUMENTO 82A FALLA FUNCIÓN DE CORRECCIÓN 82B POBRE CALIDAD DE EXPLORACIÓN 82X OTRO PROBLEMA DE IMPRESIÓN/COPIA/ESCANEO	**830 MALA CALIDAD DE IMPRESIÓN** 831 POSICIONAMIENTO ERRÓNEO DE LA IMPRESIÓN 832 BAJO CONTRASTE DE LA IMPRESIÓN 833 EXCESIVO CONTRASTE DE LA IMPRESIÓN 834 IMPRESIÓN BORROSA 835 IMPRESIÓN VAGA 836 FALTAN PUNTOS EN LA IMPRESIÓN 837 COLOR A RAYAS 838 NO COLOUR IN PART OF PICTURESIN COLOR EN PARTE DE LA IMAGEN 839 INCOMPLETA IMPRESIÓN IMAGEN/COPIA 83A FALTA DE AJUSTE 83X OTRO PROBLEMA DE MALA CALIDAD DE IMPRESIÓN	**840 IMPRESIÓN RUIDOSA** 841 LÍNEAS DE RUIDO 842 IMPRESIÓN SUCIA 843 OLOR DESAGRADABLE (OZONO) 844 TIRAS EN DIRECCIÓN DE LA ALIMENTACIÓN/ LÍNEAS NEGRAS 845 TIRAS EN DIRECCIÓN DE LA ALIMENTACIÓN/ LÍNEAS BLANCAS 846 TIRAS ATRAVESADAS EN DIRECCIÓN DE ALIMENTACIÓN/LÍNEAS NEGRAS 847 TIRAS ATRAVESADAS EN DIRECCIÓN DE ALIMENTACIÓN/LÍNEAS BLANCAS 84X OTRO PROBLEMA DE IMPRESIÓN RUIDOSA

		5 INESTABILIDAD	6 PROBLEMAS FÍSICOS Y DE GRABACIÓN	7 FUNCIÓN ESPECIAL	8 OTRAS CONDICIONES
1	GENERAL	**150 PROBLEMA DEL MANDO A DISTANCIA** 151 INACTIVO MANDO A DISTANCIA 152 OPERACIÓN ERRÓNEA DEL MANDO A DISTANCIA 153 PROBLEMA DE PROGRAMACIÓN/MEMORIZACIÓN FUNCIONES DEL MANDO A DISTANCIA 154 SENSIBILIDAD DÉBIL DEL MANDO A DISTANCIA 15X OTRO PROBLEMA DEL MANDO A DISTANCIA	**160 DAÑO FÍSICO** 161 PANEL/MUEBLE DEFORMADO/DAÑADO 162 ASA/PINZA DE TRANSPORTE DAÑADA 163 DAÑO DE BOTÓN(ES)/BOTÓN(ES) DE CONTROL/TECLA 164 DAÑO DE TAPA/CUBIERTA 165 DAÑO DE PRECINTO 166 CONECTOR/TERMINAL/ZÓCALO/ENCHUFE DAÑADO 167 DAÑO DE OBJETIVO 168 DAÑO DE CARTUCHO O AGUJA 169 DAÑO DE ANTENA 16A DAÑO DEL TUBO CATÓDICO/VISOR/INDICADOR LCD 16B PIEZAS O MATERIAL PERDIDOS 16C MARCA BORRADA 16D CIRCUITERIA QUEMADA/SALE HUMO 16E DAÑO EN SUPERFICIE EXTERNA (BURBUJEANTE/PELADO/CORROIDO/ARAÑADO) 16F HUELE 16G SOPORTE DÉBIL/DETERIORADO 16H ALTAVOZ DETERIORADO 16J APARATO MUY CALIENTE/COMPONENTE FUNDIDO 16K SUSTANCIA EXTRAÑA DENTRO DEL APARATO 16L MARCAS DE ARDER 16M SUPERFICIE INTERIOR DAÑADA (BURBUJEANTE/PELADA/CORROIDA/ARAÑADA) 16N CABLE DE RED DETERIORADO 16P ACCESORIO DETERIORADO 16R DESCOLORACIÓN 16X OTRO PROBLEMA DE DAÑO FÍSICO	**170 PROBLEMA DE LA FUNCIÓN GENERAL** 171 FALLO DE LA FUNCIÓN DE RELOJ 172 FALLO DE LA FUNCIÓN DE ADOMECER 173 FALLO DE LA PROGRAMACIÓN DEL TEMPORIZADOR 174 FALLO DE LA GRABACIÓN POR TEMPORIZADOR 175 PROBLEMA DE AJUSTA DEL USUARIO/PROGRAMACIÓN 176 FALLO EN LA OPERACIÓN DE PAUSA 177 FALLO EN LA OPERACIÓN DE LA REPRODUCCIÓN PROGRAMADA 178 FALLO EN LA FUNCIÓN DE MEMORIA 179 FALLO EN LA CONMUTACIÓN DE ENTRADA 17A FALLO EN LA CONMUTACIÓN DE SALIDA 17B DESCARGA ELÉCTRICA/DESCARGA ESTÁTICA 17C 'FALLO FUNCIÓN DE BÚSQUEDA (ÍNDICE/"VIEW"/TÍTULO/CAPÍTULO/PISTA ...)" 17D LENGUAJE EQUIVOCADO/TIPO DE CARACTERES 17E APARECE CÓDIGO DE ERROR EN EL INDICADOR 17F INTERRUPTOR NO FUNCIONA 17G PEDAL NO FUNCIONA 17H 'FALLO EN EL MODO "STANDBY" 17J FALLO EN EL MODO DE BAJO CONSUMO 17K SEÑAL DE PRECAUCIÓN NO AUDIBLE 17L FALLO EN EL MODO DE BLOQUEO/FUNCIÓN KEYLOCK 17M FALLO EN EL MODO DE CONMUTACIÓN 17N PROBLEMA EN EL MENÚ DE FUNCIONES 17X OTRO PROBLEMA DE LA FUNCIÓN GENERAL	**180 CONDICIÓN/ACCIÓN ESPECIAL** 181 PRUEBA Y CONTROL 182 REVISIÓN 183 CONVERSIÓN DE FRECUENCIA/SISTEMA 184 PUESTA EN MARCHA/INSTALACIÓN NECESARIA 185 MODIFICACIÓN/CAMBIO DE CIRCUITO O DE INSTALACIÓN 186 EQUIPAMIENTO INCORRECTO EN EL EMBALAJE 187 ACCESORIO EXTRAVIADO 188 IMPOSIBLE CONECTAR ELEMENTOS/ENSAMBLAR 189 COLOR DEFECTUOSO 18B PROBLEMA DE MONTAJE DE LA BATERÍA 18X SÍNTOMA DESCONOCIDO 18Z SÍNTOMA NO OBTENIBLE
2	COMUNICACIÓN	**250 COMUNICACIÓN INESTABLE** 251 DESVIACIÓN DE SINTONÍA 252 DESVANECIMIENTO 253 LÍNEA INTERMITENTE/LINEA SE CORTA 254 'CONEXIÓN INESTABLE O NO HAY CONEXIÓN E INDICACIÓN "SEÑAL DÉBIL"' 25X OTRO PROBLEMA DE COMUNICACIÓN INESTABLE	**260 PROBLEMA DE SINTONÍA** 261 PROBLEMA DE SINTONÍA MANUAL 262 PROBLEMA DE SINTONÍA AUTOMÁTICA 263 SINTONÍA ERRÓNEA 264 PROBLEMA DE MEMORIA DE SINTONÍA 26X OTRO PROBLEMA DE SINTONÍA	**270 PROBLEMA DE LA COMUNICACIÓN ESPECIAL** 271 FALLO EN LA COMPOSICIÓN DEL NÚMERO 272 FALLO EN LA SELECCIÓN DEL CANAL 273 ERROR DEL CONTESTADOR AUTOMÁTICO 274 FALLO EN LA REPRODUCCIÓN DEL MENSAJE 275 FALLO EN LA LLAMADA AUTOMÁTICA/FUNCIÓN DE RELLAMADA 276 FALLO DEL PROCESADO DE LA CONVERSACIÓN 277 NO HAY SEÑAL DE LLAMADA 278 TONO DE LLAMADA RUIDOSO/DÉBIL 279 MODEM SE CUELGA 27A FAX NO FUNCIONA CORRECTAMENTE 27B MODEM CREA PROBLEMAS CON EL TELÉFONO 27C SIN TONO DE LLAMADA DEL MODEM 27X OTRO PROBLEMA DE LA COMUNICACIÓN ESPECIAL	**280 PROBLEMA DE LA RECEPCIÓN ESPECIAL** 281 FALLO EN LA RECEPCIÓN DE ESTEREO 282 FALLO DEL CANAL PRINCIPAL (A) 283 FALLO DEL CANAL SECUNDARIO (B)/DUAL 284 FALLO EN LA RECEPCIÓN SSB 285 FALLO EN LA OPERACIÓN RDS/VPS/PDCXDS 286 FALLO EN LA RECEPCIÓN TELETEXTO/ SINTONIA FINA/EPG 287 FALLO EN LA RECEPCIÓN SATÉLITE/RTTY 288 FALLO EN LA OPERACIÓN FAX 289 MODEM NO ES RECONOCIDO POR EL SISTEMA 28A FALLO EN INDICADOR DE CARGA DE LLAMADA 28B FALLO FUNCIONAMIENTO MANOS LIBRES 28C APARATO BLOQUEADO 28X OTRO PROBLEMA DE LA RECEPCIÓN ESPECIAL
3	IMAGEN	**350 IMAGEN INESTABLE** 351 PROBLEMA DE SINCRONIZACIÓN 352 BOMBEO DE LA IMAGEN 353 INESTABILIDAD/JITTER DE LA IMAGEN 354 SACUDIDA DE LA IMAGEN (HORIZONTAL O VERTICAL) 355 PARPADEO DE LA IMAGEN 356 CENTELLEO DE LA IMAGEN 357 ATENUACIÓN CÍCLICA DE LA IMAGEN 358 INESTABILIDAD EN LA IMAGEN EN ARRANQUE 359 DISTORSIÓN VCR/ERROR DESPLAZAMIENTO-H 35A IMAGEN PARADA 35B SALTO/REPETICIÓN DE IMAGEN 35X OTRO PROBLEMA DE IMAGEN INESTABLE	**360 MALA GRABACIÓN DE IMAGEN** 361 NO HAY GRABACIÓN DE IMAGEN 362 NO HAY PROTECCIÓN CONTRA BORRADO DE VIDEO 363 NO HAY BORRADO DE LA GRABACIÓN DE VIDEO ANTERIOR 364 BORRADO ACCIDENTAL DE LA IMAGEN 365 NO HAY GRABACIÓN DE CÁMARA 366 GRABACIÓN DE UN SOLO CAMPO 367 GRABA SÓLO UNAS POCAS IMÁGENES 36X OTRO PROBLEMA DE MALA GRABACIÓN DE IMAGEN	**370 MALA FUNCIÓN ESPECIAL DE IMAGEN** 371 PROBLEMA DE EDICIÓN 372 FALLO DE DESVANECIMIENTO/MEZCLA 373 FALLO DE CONMUTACIÓN NEGATIVA/POSITIVA 374 FALLO DE SOBREIMPOSICIÓN/EFECTOS 375 FALLO DE LA IMAGEN DIGITAL/P-IN-P 376 FALLO EN LA TRANSMISIÓN DE IMAGEN 377 FALLO EN LA FUNCIÓN DE OBTURADOR 378 FALLO EN LA FUNCIÓN DE GENLOCK 379 FALLO EN LA FUNCIÓN DE PARPADEO/STROBOSCOPIO 37A FALLO EN IMAGEN DIGITAL/FUNCIÓN DE ZOOM 37B FALLO EN LA FUNCIÓN DE EDICIÓN AUTOMÁTICA 37C FALLO EN LA FUNCIÓN DEL ESTABILIZADOR DE IMAGEN 37D FALLO EN LA FUNCIÓN DE CAPTACIÓN DE IMAGEN 37E FALLO EN LA FUNCIÓN DE SUBTITULADO 37F FALLO EN LA REPRODUCCIÓN A BAJA VELOCIDAD 37G FALLO EN CONMUTACIÓN VIEW/MULTI-ANGLE 37H FALLO EN CONMUTACIÓN RATIO DE ASPECTO 37J PROBLEMA EN EL ÍNDICE DE PANTALLA O EN EL SEÑALADOR 37K SIN BORRADO DE PANTALLA 37X OTRO PROBLEMA DE MALA FUNCIÓN ESPECIAL DE IMAGEN	**380 PROBLEMA DE VISUALIZACIÓN/TUBO DE IMAGEN** 381 QUEMADO EN VISUALIZACIÓN/TUBO DE IMAGEN 382 RASGUÑO EN VISUALIZACIÓN/TUBO DE IMAGEN 383 POLVO EN VISUALIZACIÓN/TUBO DE IMAGEN 384 FALTA PUNTO FOSFORESCENTE/PIXEL EN VISUALIZACIÓN/TUBO DE IMAGEN 385 PUNTO(S) BRILLANTE(S) EN FÓSFORO/PIXEL 386 LÍNEAS TRANSVERSALES 387 DEFECTOS DE PIXELS FUERA DE ESPECIFICACIONES 388 FONDO BORROSO 38X OTRO PROBLEMA DE VISUALIZACIÓN/TUBO DE IMAGEN
4	COLOR	**450 COLOR INESTABLE** 451 CENTELLEO DE COLOR 452 CAMBIO DE MATIZ CONSTANTE 453 PARPADEO DE COLOR 454 NO HAY ENGANCHE DE COLOR 45X OTRO PROBLEMA DE COLOR INESTABLE	**460 MALA GRABACIÓN DE COLOR** 461 NO HAY GRABACIÓN DE COLOR/GRABACIÓN SIN COLOR 462 GRABACIÓN DE COLOR CON RUIDO 46X OTRO PROBLEMA DE MALA GRABACIÓN DE COLOR	**470 MALA FUNCIÓN ESPECIAL DE COLOR** 471 FALLO EN EL BALANCE AUTOMÁTICO DEL BLANCO 472 FALLO EN LOS EFECTOS DE COLOR 47X OTRO PROBLEMA DE MALA FUNCIÓN ESPECIAL DE COLOR	**480**
5	SONIDO	**550 SONIDO INESTABLE** 551 SALTO O REPETICIÓN DEL SONIDO 552 BOMBEO O FLUCTUACIÓN DEL SONIDO 553 INTERRUPCIÓN DEL SONIDO 554 MUTING CÍCLICO DEL SONIDO 555 LLORO Y ULULEO 556 REALIMENTACIÓN ACÚSTICA 557 ECO EN SONIDO 55X OTRO PROBLEMA DE SONIDO INESTABLE	**560 MALA GRABACIÓN DEL SONIDO** 561 NO HAY GRABACIÓN DEL SONIDO 562 NO HAY PREVENCIÓN CONTRA BORRADO DEL SONIDO 563 NO HAY BORRADO DE LA GRABACIÓN DE AUDIO ANTERIOR 564 BORRADO ACCIDENTAL DEL SONIDO 565 NO HAY GRABACIÓN DEL MENSAJE 566 GRABACIÓN DE SONIDO DISTORSIONADA 56X OTRO PROBLEMA DE MALA GRABACIÓN DEL SONIDO	**570 MALA FUNCIÓN ESPECIAL DE AUDIO** 571 FALLO EN LA OPERACIÓN DE DESVANECIMIENTO 572 FALLO EN LA OPERACIÓN DE ECO 573 FALLO EN LA OPERACIÓN DE MEZCLA 574 FALLO EN LA OPERACIÓN DE MODO DE REPETICIÓN 575 FALLO EN LA OPERACIÓN DE PROCESADO DEL SONIDO 576 FALLO EN LA OPERACIÓN DE GRABACIÓN SINCRONIZADA 577 FALLO EN LA OPERACIÓN DE DBB/DOL 578 FALLO EN LA OPERACIÓN DE LA REDUCCIÓN DEL RUIDO 579 FALLO EN LA FUNCIÓN DE DOBLAJE DE SONIDO 57A FALLO EN EL TÍTULO DEL PROGRAMA 57B FALLO EN CONTROL DEL MICRÓFONO 57C FALLO EN CONTROL DE VELOCIDAD 57X OTRO PROBLEMA DE MALA FUNCIÓN ESPECIAL DE AUDIO	**580 PROBLEMA DE LA OPERACIÓN ESTEREO/MULTI** 581 NO HAY ESTEREO 582 MALA SEPARACIÓN DE CANALES 583 DIFERENCIA DE FASE ENTRE CANALES 584 PROBLEMA CON EL MODO SURROUND 585 PROBLEMA CON EL MODO PCM 58X OTRO PROBLEMA DE LA OPERACIÓN ESTEREO/MULTI
6	MECÁNICA	**650 INESTABILIDAD MECÁNICA** 651 PIES DESIGUALES 652 BISAGRA DEFECTUOSA 653 VIBRA/SALTA 654 PARTES FLOJAS 655 VOLANTE(S) DETERIORADO(S) 65X OTRO PROBLEMA DE INESTABILIDAD MECÁNICA	**660 DAÑO AL SISTEMA** 661 CINTA DAÑADA 662 DISCO DAÑADO 663 CINTA DEVORADA/ARRUGADA 664 CINTA ENREDADA/CORTADA 665 CINTA RIZADA 666 CINTA FLOJA 667 CINTA ADHERIDA/PEGADA 66X OTRO PROBLEMA DE DAÑO DEL SOFTWARE	**670 PROBLEMA DE LA OPERACIÓN MECÁNICA** 671 FALLO DE LA OPERACIÓN DE ARRANQUE/PARADA 672 FALLO DE LA OPERACIÓN DE PAUSA 673 FALLO EN LA BÚSQUEDA AUTOMÁTICA DEL PROGRAMA 674 FALLO DEL MODO CUE/REVIEW 675 FALLO DE LA OPERACIÓN DE MOVIMIENTO LENTO 676 FALLO DEL MODO DE EXPLORACIÓN RÁPIDA 677 FALLO DEL A FUNCIÓN DE COPIADO A ALTA VELOCIDAD 678 FALLO DE LA OPERACIÓN DE MODO REPETICIÓN 679 FALLO DEL MODO REC REVIEW 67A FALLO FUNCIÓN AMS 67B MAL FUNCIONAMIENTO DEL AUTO-REVERSE 67C FALLO EN LA DETECCIÓN DEL FIN DE CINTA 67D FALLO EN LA CONMUTACIÓN DE LA CARA DEL DISCO (SELECCIÓNA A-B) 67X OTRO PROBLEMA DE LA OPERACIÓN MECÁNICA	**680 PROBLEMA DE OBJETIVO** 681 PROBLEMA DE ENFOQUE 682 PROBLEMA DE ZOOM 683 PROBLEMA DE IRIS 684 PROBLEMA DE MACRO 68X OTRO PROBLEMA DE OBJETIVO
7	PROCESADO DE DATOS	**750 PROBLEMA PERIFÉRICO (NO ALMACENAJE)** 751 PERIFÉRICO NO ARRANCA 752 FALLO DE LA COMUNICACIÓN CON EL PERIFÉRICO 753 FALLO PERIFÉRICOS INTERNOS 754 FALLO PERIFÉRICOS EXTERNOS 755 ERROR TARJETA DE RED 756 FALLO EN AUTO PRUEBA EL PERIFÉRICO 75X OTRO PROBLEMA PERIFÉRICO	**760 PROBLEMA DE ALMACENAJE DE DATOS** 761 PROBLEMA DE FORMATEADO 762 PÉRDIDA DE DATOS ALMACENADOS 763 FALLO EN LA MEMORIA DE CUADRO 764 ERRORES DE LECTURA/ESCRITURA 765 PROBLEMA DE DISPOSITIVO ÓPTICO O HARD 766 'PROBLEMA DE CONTROL DEL "FLOPPY"' 767 PROBLEMA DE CONTROL CD/DVD-ROM 768 PROBLEMA DE CINTA 769 NO SE MONTARÁ LA EXCITACIÓN/NO SE PUEDE ACCEDER A LA EXCITACIÓN 76A PROBLEMA DE INTERCAMBIO DE DISCOS 76B FUNCIONAMIENTO LECTURA/ESCRITURA MUY LENTO 76X OTRO PROBLEMA DE LECTURA/ESCRITURA DE DATOS	**770 MAL PROCESADO ESPECIAL DE DATOS** 771 FALLO DE AUTO-DIAGNÓSTICO 772 FALLO DE PROCESADO DE TEXTO 773 FALLO DE EDICIÓN GRÁFICA 774 EL PROGRAMA NO PUEDE INSTALARSE 775 NO PUEDE ARRANCARSE EL PROGRAMA PRECARGADO 776 NO PUEDE ARRANCARSE NINGÚN PROGRAMA PRECARGADO 777 ALARMA DE VIRUS 77X OTRO PROBLEMA DE MAL PROCESADO ESPECIAL DE DATOS	**780 PROBLEMA DE INTERFACE** 781 PROBLEMA DE INTERFACE USB 782 PROBLEMA DE INTERFACE PARALELO 783 PROBLEMA DE INTERFACE SCSI 784 PROBLEMA DE INTERFACE SERIE 785 INCOMPATIBLE CON OTROS SISTEMAS 786 PROBLEMA DE INTERFACE AUDIO/VÍDEO 787 PROBLEMA INTERFACE i.LINK/FIREWIRE/IEEE1394 78X OTRO PROBLEMA DE INTERFACE
8	IMPRESIÓN/COPIADO/ESCANEADO	**850 FUNCIÓN INESTABLE EN LA IMPRESIÓN** 851 CARGA INESTABLE DEL PAPEL 852 CARGA INESTABLE DE PAPEL MÚLTIPLE 853 MALA ALINEACIÓN DE CARACTERES 85X OTRO PROBLEMA DE FUNCIÓN INESTABLE EN LA IMPRESIÓN	**860 PROBLEMA DE CINTA/PAPEL** 861 CINTA CORTADA 862 ATASCO DE CINTA 863 CINTA DESCARRILADA 864 PAPEL ADHERIDO AL MECANISMO 865 PAPEL BLOQUEADO 866 SALTOS DE DOCUMENTO 867 MENSAJES DE ERRORES FALTA DE TINTA/TONER 86X OTRO PROBLEMA DE CINTA/PAPEL	**870**	**880 MALA FUNCIÓN DE PÓLIZAS/CARACTERES** 881 CARACTERES O IMAGEN INCORRECTOS 882 TAMAÑO ERRÓNEO DE CARACTERES 883 MALA CARGA DE LAS PÓLIZAS DE CARACTERES 88X OTRO PROBLEMA DE MALA FUNCIÓN DE PÓLIZAS/CARACTERES

(*1)

CUIDADO

'LOS CÓDIGOS EXTENDIDOS "X" (*-**X) PUEDEN SOLAMENTE UTILIZARSE PARA INDICAR QUE UNA DESCRIPCIÓN APROPIADA DEL SÍNTOMA FALTA EN EL GRUPO'

MERCANCÍA PARDA

REV 03 - 2000/02

EACEM - CÓDIGOS DE SECCIÓN

COMÚN	
ANT	SECCIÓN DE LA ANTENA
APR	PROCESADO DE SEÑALES (ANALÓGICO)
BCH	CARGA DE BATERÍA
CLK	SECCIÓN DE RELOJ
CPA	PROCESADO DE COLOR ANALÓGICO
CTR	PANEL DE CONTROL
DPR	PROCESADO DE SEÑALES (DIGITAL)
ERA	CIRCUITO DE BORRADO
FLX	PLACA FLEXIBLE
HFS	SECCIÓN DE ALTA FRECUENCIA
IDS	SECCIÓN DEL DISPLAY DE INFORMACIÓN
IFC	CIRCUITO FI
ILN	SECCIÓN i.LINK (IEEE1394)
INP	SECCIÓN DE ENTRADA DE SEÑALES
IRD	SECCIÓN INFRA-ROJOS (IRDA)
MEM	SECCIÓN DE MEMORIA
OUT	SECCIÓN DE SALIDA DE SEÑALES
PRG	SECCIÓN DE PROGRAMACIÓN
PRT	CIRCUITO DE PROTECCIÓN
PSU	ALIMENTACIÓN
PWA	SECCIÓN DEL AMP DE POTENCIA
REM	SECCIÓN DEL CONTROL REMOTO
RFU	AMPLIFICADOR/UNIDAD RF
SFT	SOFTWARE (CINTA/DISCO/ETC.)
SNS	UNIDAD DE DETECCIÓN
SVO	SECCIÓN DE SERVO
SYS	SECCIÓN DEL SISTEMA DE CONTROL
TUN	SECCIÓN DE SINTONIZACIÓN
TXT	PROCESADO DE TEXTOS

SONIDO	
APA	PROCESADO DE AUDIO ANALÓGICO
APD	PROCESADO DE AUDIO DIGITAL
CDC	SECCIÓN CAMBIADOR CD
CDS	SECCIÓN CD
MDC	SECCIÓN CAMBIADOR MD
MDS	SECCIÓN MINIDISC
MIC	SECCIÓN DE MICRÓFONO
PUD	DISPOSITIVO CAPTADOR
SHD	CABEZAS FIJAS
SPK	ALTAVOZ

IMAGEN	
CAM	CIRCUITO CÁMARA
CPD	PROCESADO DE COLOR DIGITAL
CRT	TUBO DE IMAGEN
DFL	CIRCUITO DE DEFLEXIÓN
DVD	SECCIÓN DVD
FPK	CONJUNTO DE ENFOQUE
IMG	UNIDAD DE VISUALIZACIÓN DE IMÁGENES
LCD	SECCIÓN LCD
LMP	SECCIÓN FLASH/LÁMPARA
VPA	PROCESADO DE VIDEO ANALÓGICO
VPD	PROCESADO DE VIDEO DIGITAL
VWF	VISOR

PC	
FDD	EXCITADOR DEL FLOPPY DISC
FMW	PROGRAMACIÓN FIJA
HDD	EXCITADOR DEL DISCO DURO
ISA	SECCIÓN ISA
JST	JOYSTICK
KBD	TECLADO
MDM	SECCIÓN MODEM
NIF	RED DE INTERCONEXIÓN
PAR	PUERTA PARALELO
PCC	TARJETA PC
PCI	SECCIÓN PCI
SCS	PUERTA SCSI
SER	PUERTA SERIE
USB	PUERTA USB

MECÁNICO	
ARM	MECANISMO DEL BRAZO
BZL	BEZEL (MUEBLE FRONTAL)
CBT	MUEBLE
CHA	CHASIS
DDM	SECCIÓN DE ACCIONAMIENTO DEL DISCO
EXC	CONECTOR EXTERNO
HCM	MECANISMO DE SOPORTE DE LA CABEZA
HOL	SOPORTE DE CASSETTE
INC	CONECTOR INTERNO
LDG	MECANISMO DE CARGA
LNM	MECANISMO DE LENTE
PFM	MECANISMO DE ALIMENTACIÓN DEL PAPEL
PIN	RODILLO/PALANCA DE APRIETE
PRI	BLOQUE DE IMPRESOR
RFM	MECANISMO DE ALIMENTACIÓN DE LA CINTA
RHD	CABEZAS ROTATIVAS
SLD	MECANISMO DE SEGUIMIENTO
SRS	SECCIÓN DEL CARRETE DE SUMINISTRO
STA	BLOQUE ESTÁTICO
TDM	MECANISMO DE ACCIONAMIENTO DE LA CINTA
THR	MECANISMO DE ENHEBRADO
TNR	REGULADOR DE LA TENSIÓN DE LA CINTA
TPT	CAMINO DE LA CINTA
TRS	SECCIÓN DEL CARRETE DE RECOGIDA
WIR	CABLE
XXX	PIEZAS ESTÉTICAS

EJEMPLO:

BANDEROLA	CÓDIGO DE SÍNTOMA	CÓDIGO DE REPUESTO	NÚMERO DE REFERENCIA	SECCIÓN	PLACA	CÓDIGO DE DEFECTO	CÓDIGO DE REPARACIÓN	CANTIDAD
1	1 4 1 2	1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	R 1 2 3	T D M	Y A 2 2 . . .	C 1	Z 1	. .
.	3 6 4 1	3 4 5 6 7 8 9 X X X X X X X X X	1 1 1					. .

BANDEROLA: INDICA LA ÚNICA Y PRINCIPAL COMBINACIÓN SÍNTOMA/COMPONENTE POR '1'

CÓDIGOS DE LOS DEFECTOS

MECÁNICO	
A	GASTADO (O DEFECTO MECÁNICO EN GENERAL)
A1	ERROR DE FUNCIONAMIENTO
B	ENSUCIADO/MANCHADO
C	DESAJUSATADO MECÁNICAMENTE
D	CORTADO/DEFECTUOSO
E	DESFORMADO
F	ENGANCHADO/BLOQUEADO
G	RAYADO/ABOLLADO/BORDES CORTANTES
H	HENDIDURA/PELADO/CORROIDO/FUNDIDO
I	SEPARADO/SUELTO/RAYADO
J	INESTABILIDAD
K	PÉRDIDA (MECÁNICA)
L	SECO (SIN LUBRIFICANTE)
M	CUERPO EXTRAÑO

ELÉCTRICO	
N	COMPONENTE ELÉCTRICO/MÓDULO DEFECTUOSO
O	QUEMADO/FORMACIÓN DE ARCO/PIXELS QUE FALTAN
P	MAL AJUSTADO ELÉCTRICAMENTE/MAL AJUSTADO
Q	CORTOCIRCUITO
R	CIRCUITO ABIERTO
S	FUGA (ELÉCTRICA)
T	MAL CONTACTO/SOLDADURA
T1	MALA CONEXIÓN A TIERRA
U	CIRCUITO ABIERTO
V	PLACA HENDIDA
W	SOLDADURA SECA O QUE FALTA
X	SOLDADURA EN PUENTE
Y	MÓDULO/COMPONENTE EQUIVOCADO
Z	MÓDULO/COMPONENTE PERDIDO
1	PROBLEMA DE SOFTWARE
11	PÉRDIDA DE DATO DESDE LA MEMORIA
12	FALLO EN AJUSTE/INSTALACIÓN DE PROGRAMA
13	SOFTWARE DEFECTUOSO O INCOMPLETO
14	PROBLEMA DE AJUSTE DEL SOFTWARE
15	NO IDENTIFICA/VERIFICA EL PRODUCTO O EL USUARIO
2	AGOTADO/EMISIÓN DEBIL
3	NO SE ENCUENTRA PROBLEMA (APARATO DENTRO DE ESPEC.)
4	NO SE ENCUENTRA PROBLEMA - EQUIVOCACIÓN DEL USUARIO
5	NO SE ENCUENTRA PROBLEMA - CONDICIONES LOCALES
51	FALLO EN LA TENSIÓN PRINCIPAL
6	IMPOSIBLE DIAGNOTICAR FALLO
7	INCORRECTAMENTE CABLEADO/MONTADO
81	CONEXIÓN INCORRECTA DEL EQUIPO
9	MAL USO POR EL USUARIO
93	MODIFICACIÓN NO AUTORIZADA

CÓDIGOS DE REPARACIÓN

A	SUBSTITUCIÓN
B	AJUSTE MECÁNICO
C	AJUSTE ELÉCTRICO
D	RESOLDADURA
D1	REPARACIÓN/RECOLOCAR EN SU SITIO (CONECTOR/TUBO/...)
E	LIMPIEZA
F	ENGRASE
G	COMPONENTES ELÉCTRICOS REPARADOS
H	COMPONENTES MECÁNICOS REPARADOS
I	MODIFICACIÓN SOLICITADA POR EL FABRICANTE
J	DESMONTADO
K	AÑADIDO
L	COMPROBACIÓN FUNCIONAL
M	MEDICIÓN DE ESPECIFICACIÓN
N	MANTENIMIENTO
O	REPULIR
P	SUBSTITUCIÓN PREVENTIVA DE COMPONENTES

Q	ACCIÓN PREVENTIVA SIN SUBSTITUCIÓN DE COMPONENTES
U	EXPLICACIÓN AÑADIDA
V	PRESUPUESTO RECHAZADO
W	PRESUPUESTO CON COMPONENTES
X	PRESUPUESTO SIN COMPONENTES
Y	VUELTO AL CLIENTE SIN REPARACIÓN
Z	CAMBIO DEL APARATO
Z1	CAMBIO DE PRODUCTO (REPARACIÓN MUY CARA)
Z2	CAMBIO DE PRODUCTO (MUCHAS VISITAS/REPARACIONES)
Z3	CAMBIO DE PRODUCTO (REPUESTO NO OBTENIBLE)
Z4	CAMBIO DE PRODUCTO (IMPOSIBLE DE REPARAR)
Z5	CAMBIO DE PRODUCTO (SOLICITADO AL DETALLISTA)
Z6	CAMBIO DE PRODUCTO (SOLICITADO POR EL FABRICANTE)
1	CORRECCIÓN DEL SOFTWARE/REAJUSTE
2	ACTUALIZACIÓN DEL SOFTWARE
3	PRODUCTO ACTUALIZADO (SOBRE PEDIDO)

TECHNICAL INFORMATION

Chassis concerned : ICC17 (25"MP & 28"MP)

Symptom/ Problem observed :
Spare Parts List, component part number amendment.

Solution implemented :
To optimize the CRT heater supply voltage for the above mentioned tubes, both LL05(DST) and LB02 (coil) have been changed.

LL05 : Old Part No. 10546610 ---> **New Part No. 10600190**
LB02 : Old Part No. 10477930 ---> **New Part No. 25349470**

Comment :
Both components must be replaced at the same time.

TECHNICAL INFORMATION

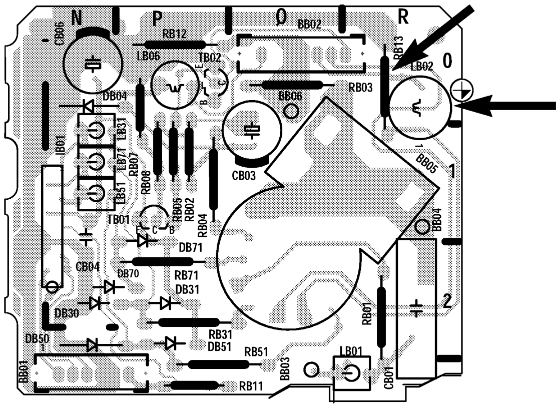
Finished products / Chassis concerned :
All TV sets equiped with ICC17 chassis (CRT Board)

Subject : Protection of transistor TB02 against arcing

Symptom/ Problem observed :
Transistor type number BF422 used in position TB02 found defective.

Cause :
Arcing.

Solution implemented :
- Remove the resistor at location RB13.
- On the copper side of the CRT PCB, add an insulated wire link between pin 1 of inductor LB02 and pin 4 of the CRT socket (ground).


N
P
O
R
CB06
RB12
BB02
LB06
TB02
RB13
LB02
0
DB04
BB06
RB03
LB31
LB71
RB07
RB08
LB51
IB01
CB03
BB05
1
RB05
RB02
RB04
BB04
TB01
DB71
CB04
DB70
RB71
DB31
DB30
2
RB01
DB50
RB31
DB51
RB51
BB03
LB01
CB01
BB01
RB11

IRIS CODE: the code mentioned below must be used to report this failure on the warranty sheet. It will make your report easier and more reliable

Condition/ Symptom	Part No	Qty	Position	Section	Fault Code	Repair Code
1 3 1 5	☐☐☐☐☐☐☐☐	☐	☐ R B 1 3	V P A	☐ Y	☐ T

You do not need to write anything in the white boxes. ☐

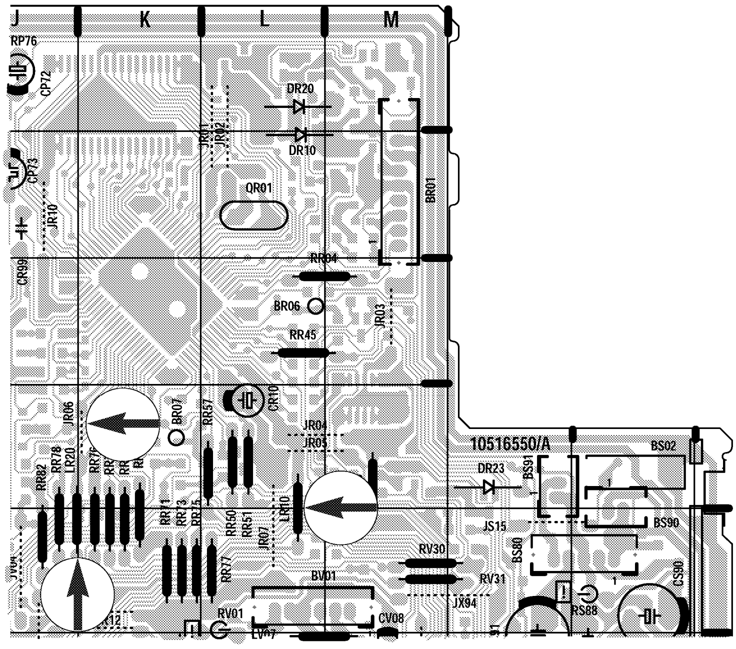
TECHNICAL INFORMATION

Chassis concerned : ICC17

Symptom/ Problem observed :
Moiré patterning visible on some channels.

Cause :
High frequency cross modulation.

Solution implemented
- Remove the jumper link at location JR06.
- Remove the inductor at location LR20.
- Replace LR10 10µH inductor with a jumper link.


J
K
L
M
RP76
CP72
DR20
DR10
JR01
JR02
QR01
BR01
CP73
JR10
CR99
RR04
BR06
RR45
JR03
CR10
BR07
RR57
JR06
JR04
JR05
10516550/A
BS02
RR82
RR78
LR20
DR23
BS91
RR11
RR13
RR15
RR50
RR51
JR07
LR10
JS15
BS80
BS90
RV30
RV31
CS90
RR77
BV01
JX94
RS88
RV01
CV08

TECHNICAL INFORMATION

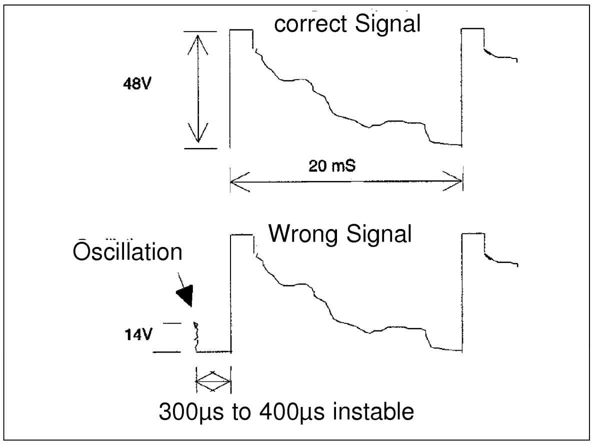
Chassis concerned : ICC17

Problem observed :
Different symptoms can be observed
- TV stuck in the Standby Mode with the safety mode active (code 27).
- Unstable OSD graphics.
- Sporadic or intermittent vertical scan.

Cause :
Parasitic oscillation at pin 7 of IF01 (see attached)

Solution implemented :
The problem is still under investigation to identify the basic cause of the problem, but to initially over come the problem we recommend changing the following components:
- Change RF08 from 4.7Ω or 27Ω to 68Ω5% 0.700w Part No. 15009050.
- Change CF08 from 100nF to 220nF 20% 63V Part No. 43302770.

If problem is still not resolved after changing the above mentioned resistors the replace IF01.



IRIS CODE: the code mentioned below must be used to report this failure on the warranty sheet. It will make your report easier and more reliable

Condition/ Symptom	Part No	Qty	Position	Section	Fault Code	Repair Code
1119	15009050	01	RF08	DFL	Y	A
	43302770	01	CF08	DFL	Y	A

You do not need to write anything in the white boxes. ☐

TECHNICAL INFORMATION

Chassis concerned : ICC17 (with PCB index 02)

Problem observed :
The TV will not come out the Standby Mode.

Cause :
When starting, the base drive current to TP50 is too low.

Solution implemented :
Change the diode in position DP39 (LL4148) to a resistor strap Part No. 41047950.

IRIS CODE: the code mentioned below must be used to report this failure on the warranty sheet. It will make your report easier and more reliable

Condition/ Symptom	Part No	Qty	Position	Section	Fault Code	Repair Code
1 1 1 9	4 1 0 4 7 9 5 0	0 1	☐ D P 3 9	P S U	☐ Y	☐ A

You do not need to write anything in the white boxes. ☐

TECHNICAL INFORMATION

Chassis concerned : ICC17

Problem observed :
At switch "ON", the TV's standby power supply does not work.

Cause :
The reverse voltage of the diodes used in positions DP16/17/18/19 (1N4001) is too low especially when the mains voltage is at highest.

Solution implemented :
Change the diodes used in positions DP16/17/18/19 with higher reverse breakdown voltage (400V) type number 1N4004, Part No. 44009009.

IRIS CODE: the code mentioned below must be used to report this failure on the warranty sheet. It will make your report easier and more reliable

Condition/ Symptom	Part No	Qty	Position	Section	Fault Code	Repair Code
1119	44009009	01	DP16	PSU	Y	A
	44009009	01	DP17	PSU	Y	A
	44009009	01	DP18	PSU	Y	A
	44009009	01	DP19	PSU	Y	A

You do not need to write anything in the white boxes. ☐

TECHNICAL INFORMATION

Chassis concerned : ICC17 (with PCB index 02)

Problem observed : .
East/West correction circuit failure.

Cause :
The transistor used in position TL41 (BD241C) is damaged due to CRT flashover.

Solution implemented :
After replacement TL41, add a RGP10G protection diode in position DL41 in parallel with TL41 (cathode to the collector of TL41 and the anode to ground), Part No. 10459090.

IRIS CODE: the code mentioned below must be used to report this failure on the warranty sheet. It will make your report easier and more reliable

Condition/ Symptom	Part No	Qty	Position	Section	Fault Code	Repair Code
3335	10459090	01	☐DL41	DFL	☐Z	☐K

You do not need to write anything in the white boxes. ☐

TECHNICAL INFORMATION

Chassis concerned : ICC17

Subject : Improvement of the reception with internal antenna

Problem observed :
Moiré patterning, mainly visible on VHF channels.

Cause:
Inference being caused by the switch mode power supplies when using a set top aerial.

Solution implemented :
Change the value of capacitor CP49 from 1.5nF into 3.3nF 20% 1.6KV code 10607950.

Please change the following components in order to change the frequency of operation of the power as follows :

- Capacitor CP16/CP17 from 220nF to a 470nF 20% 275V Part No. 10596570.
- Capacitor CP41 from 10nF 63V to a 10nF 10% 100V Part No. 70427750.
- Resistor RP53 from 5.6kΩ to a 5.1kΩ 5% 0.100W Part No. 30611700.
- Resistor RP56 from 10kΩ to a 2.2kΩ 5% 0.100W Part No. 40077900.

IRIS CODE: the code mentioned below must be used to report this failure on the warranty sheet. It will make your report easier and more reliable

Condition/ Symptom	Part No	Qty	Position	Section	Fault Code	Repair Code
1224	10607950	01	CP49	PSU	Y	A
	10596570	01	CP16	PSU	Y	A
	10596570	01	CP17	PSU	Y	A
	70427750	01	CP41	PSU	Y	A
	30611700	01	RP53	PSU	Y	A
	40077900	01	RP56	PSU	Y	A

You do not need to write anything in the white boxes. ☐

TECHNICAL INFORMATION

Chassis concerned : ICC17

Problem observed :
Visible flash over after quickly switch Off and On again.

Solution implemented :
Change the value of capacitor CI57 from 2.2µF to a 1µF 20% 100V, Part No. 256728.

IRIS CODE: the code mentioned below must be used to report this failure on the warranty sheet. It will make your report easier and more reliable

Condition/ Symptom	Part No	Qty	Position	Section	Fault Code	Repair Code
1 3 2 1	☐ ☐ 2 5 6 7 2 8	0 1	☐ C I 5 7	A P R	☐ Y	☐ A

You do not need to write anything in the white boxes. ☐

GENERAL INFORMATION

METHODOLOGY

1 - ON POWER-UP :

- Observe the behaviour of the two-coloured LED: note the various stages and compare them to the normal cycle.

By doing this, the time at which the problem arose and the part of the circuit which needs to be investigated can be identified.

2 -TROUBLE SHOOTING PROCEDURE: LED BEHAVIOUR

In certain cases the LED will flash when transmitting a message:

LED flashing : message being transmited.

Count the flashes : code is two bursts separated by a pause of 0.7 s and repeated several times.

See the error code table. → **LIST OF LED MESSAGE ERROR CODES**

This data is more precise than colour changes but still incomplete, since various causes may generate the same code.

3 - FAULT FINDING :

Carryout of stages 1 and 2: an oscilloscope test may clarify the code transmitted in stage two.

a - The television set operates fully or partially

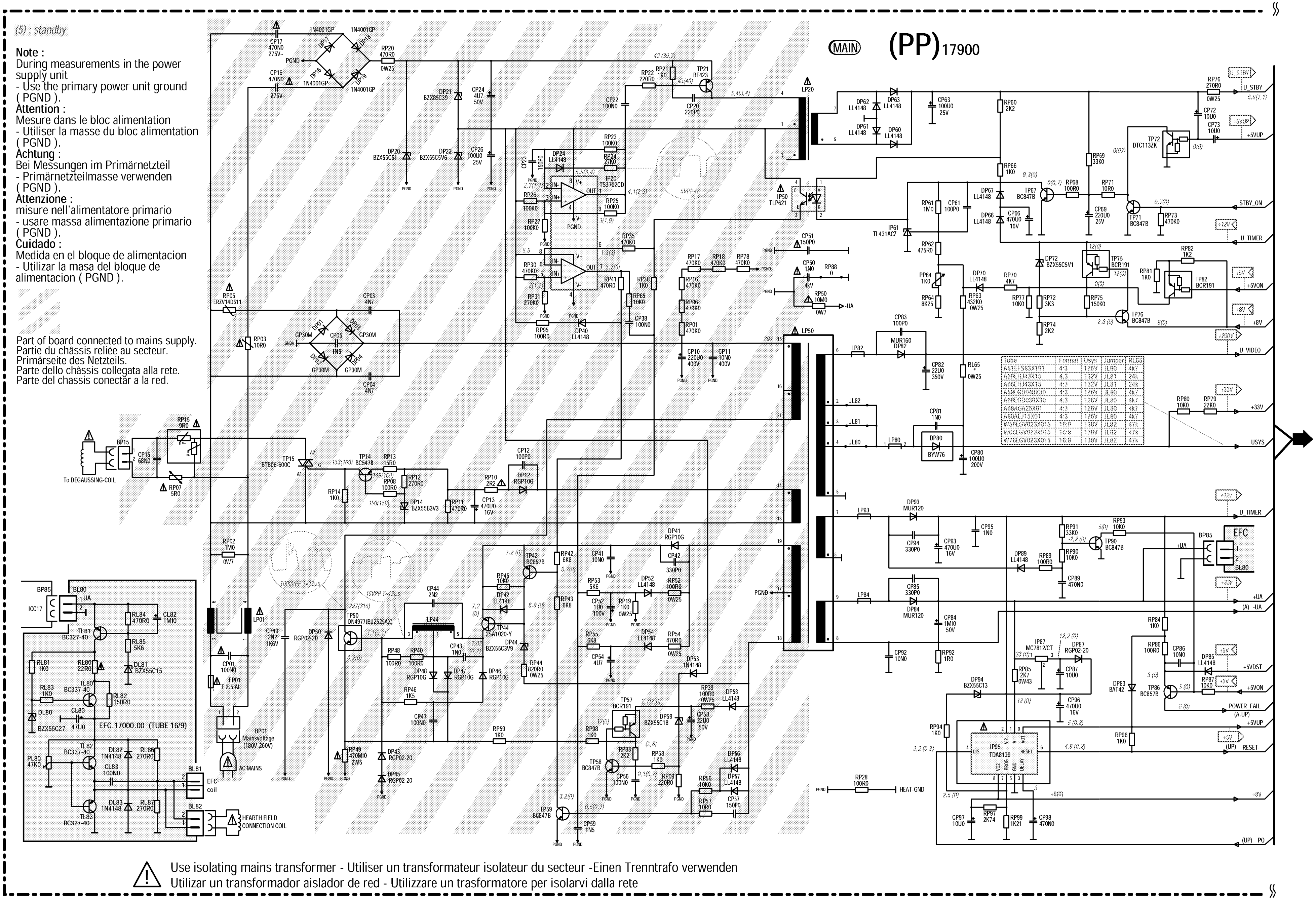
- Use LED message observation fault finding methods 1 and 2. See also the faults listed relating to fault finding by symptom.

b - The television goes into permanent or cyclical security mode

- Observe LED’s behaviour (flashing red, stable orange followed by flashing, etc.).

Select the relevant box in the column (LED behaviour fault finding).

POWER SUPPLY - ALIMENTATION - NETZTEIL - ALIMENTAZIONE - ALIMENTACIÓN


(5) : standby
MAIN
(PP)17900
To DEGAUSSING-COIL
EFC.17000.00 (TUBE 16/9)
EFC-coil
HEARTH FIELD CONNECTION COIL
AC MAINS
Mainsvoltage (180V-260V)
BP01
BP15
BP85
BL80
BL81
BL82
ICC17
EFC
LP20
LP44
LP50
IP20 TS3702CD
IP50 TLP621
IP61 TL431ACZ
IP87 MC7812/CT
IP95 TDA8139
TP14 BC547B
TP15 BTB06-600C
TP21 BF423
TP42 BC857B
TP44 2SA1020-Y
TP50 ON4977(BU2525AX)
TP57 BCR191
TP58 BC847B
TP59 BC847B
TP67 BC847B
TP71 BC847B
TP72 DTC113ZK
TP75 BCR191
TP76 BC847B
TP82 BCR191
TP86 BC857B
TP90 BC847B
TL80 BC337-40
TL81 BC327-40
TL82 BC337-40
TL83 BC327-40
PGND
HEAT-GND
U_STBY
+5VUP
STBY_ON
U_TIMER
+5VON
+8V
U_VIDEO
+33V
USYS
+UA
(A) -UA
+5VDST
POWER_FAIL (A.UP)
(UP) RESET-
(UP) PO
1000VPP T=12µs
150VPP T=12µs
5VPP-H

Tube	Format	Usys	Jumper	RL65
A51EFS83X191	4:3	126V	JL80	4k7
A59EHJ43X15	4:3	132V	JL81	24k
A66EHJ43X15	4:3	132V	JL81	24k
A59EGD048X30	4:3	126V	JL80	4k7
A68EGD038X30	4:3	126V	JL80	4k7
A68AGA25X01	4:3	126V	JL80	4k7
A80AEJ15X01	4:3	126V	JL80	4k7
W56EGV023X015	16:9	138V	JL82	47k
W66EGV023X015	16:9	138V	JL82	47k
W76EGV023X015	16:9	138V	JL82	47k

Note :
During measurements in the power supply unit
- Use the primary power unit ground (PGND).

Attention :
Mesure dans le bloc alimentation
- Utiliser la masse du bloc alimentation (PGND).

Achtung :
Bei Messungen im Primärnetzteil
- Primärnetzteilmasse verwenden (PGND).

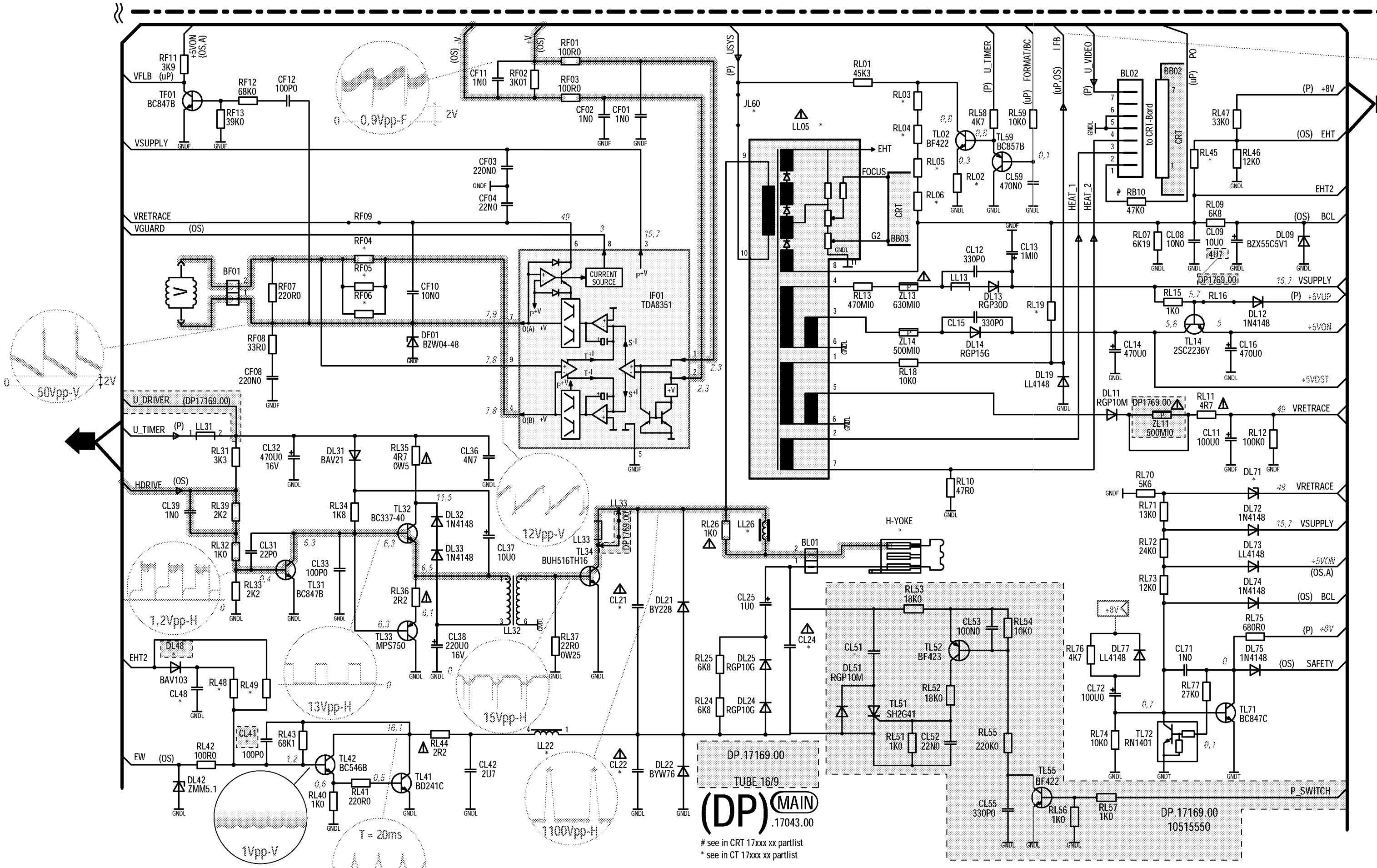
Attenzione :
misure nell'alimentatore primario
- usare massa alimentazione primario (PGND).

Cuidado :
Medida en el bloque de alimentacion
- Utilizar la masa del bloque de alimentacion (PGND).

Part of board connected to mains supply.
Partie du châssis reliée au secteur.
Primärseite des Netzteils.
Parte dello châssis collegata alla rete.
Parte del chassis conectar a la red.

⚠ Use isolating mains transformer - Utiliser un transformateur isolateur du secteur -Einen Trenntrafo verwenden
Utilizar un transformador aislador de red - Utilizzare un trasformatore per isolarvi dalla rete

SCANNING - BALAYAGE - ABLENKUNG - BARRIDO - SCANSIONE


VFLB (uP)
VSUPPLY
VRETRACE
VGUARD (OS)
RF11 3K9
+5VON (OS,A)
TF01 BC847B
RF12 68K0
CF12 100P0
RF13 39K0
0,9Vpp-F
2V
CF11 1N0
RF02 3K01
RF01 100R0
RF03 100R0
CF02 1N0
CF01 1N0
CF03 220N0
CF04 22N0
RF09
RF04
RF05
RF06
RF07 220R0
CF10 10N0
DF01 BZW04-48
BF01
RF08 33R0
CF08 220N0
50Vpp-V
CURRENT SOURCE
IF01 TDA8351
USYS
JL60
LL05
EHT
FOCUS
CRT
G2
BB03
RL01 45K3
RL03
RL04
RL05
RL06
RL02
TL02 BF422
RL58 4K7
RL59 10K0
TL59 BC857B
CL59 470N0
U_TIMER
FORMAT/BC
LFB
(uP,OS)
U_VIDEO
HEAT_1
HEAT_2
BL02
BB02
to CRT-Bord
RB10 47K0
RL47 33K0
RL45
RL46 12K0
(P) +8V
(OS) EHT
EHT2
RL09 6K8
(OS) BCL
RL07 6K19
CL08 10N0
CL09 10U0
DL09 BZX55C5V1
DP17169.00
VSUPPLY
RL15 1K0
RL16
DL12 1N4148
(P) +5VUP
+5VON
TL14 2SC2236Y
CL14 470U0
CL16 470U0
+5VDST
CL12 330P0
CL13 1MI0
LL13
DL13 RGP30D
RL13 470MI0
ZL13 630MI0
RL19
ZL14 500MI0
CL15 330P0
DL14 RGP15G
RL18 10K0
DL19 LL4148
DL11 RGP10M
RL11 4R7
ZL11 500MI0
CL11 100U0
RL12 100K0
VRETRACE
RL10 47R0
RL70 5K6
DL71
RL71 13K0
DL72 1N4148
VSUPPLY
RL72 24K0
DL73 LL4148
+5VON (OS,A)
RL73 12K0
DL74 1N4148
(OS) BCL
RL75 680R0
(P) +8V
DL75 1N4148
(OS) SAFETY
CL71 1N0
RL76 4K7
DL77 LL4148
CL72 100U0
RL77 27K0
TL71 BC847C
RL74 10K0
TL72 RN1401
P_SWITCH
DP.17169.00 10515550
U_DRIVER (DP17169.00)
U_TIMER (P)
LL31
RL31 3K3
CL32 470U0 16V
DL31 BAV21
RL35 4R7 0W5
CL36 4N7
HDRIVE (OS)
CL39 1N0
RL39 2K2
RL34 1K8
TL32 BC337-40
DL32 1N4148
DL33 1N4148
CL37 10U0
RL32 1K0
CL31 22P0
CL33 100P0
TL31 BC847B
RL33 2K2
1,2Vpp-H
RL36 2R2
TL33 MPS750
CL38 220U0 16V
13Vpp-H
15Vpp-H
LL32
RL37 22R0 0W25
LL33
TL34 BUH516TH16
12Vpp-V
CL21
DL21 BY228
RL26 1K0
LL26
BL01
H-YOKE
CL25 1U0
CL24
RL25 6K8
DL25 RGP10G
RL24 6K8
DL24 RGP10G
RL53 18K0
CL53 100N0
RL54 10K0
CL51
DL51 RGP10M
TL52 BF423
RL52 18K0
TL51 SH2G41
RL51 1K0
CL52 22N0
RL55 220K0
TL55 BF422
CL55 330P0
RL56 1K0
RL57 1K0
DP.17169.00
TUBE 16/9
EHT2
DL48
BAV103
CL48
RL48
RL49
CL41 100P0
RL43 68K1
EW (OS)
RL42 100R0
DL42 ZMM5.1
TL42 BC546B
RL44 2R2
TL41 BD241C
RL41 220R0
RL40 1K0
CL42 2U7
LL22
CL22
DL22 BYW76
1Vpp-V
T = 20ms
1100Vpp-H
GNDL
GNDF
(DP) MAIN .17043.00

see in CRT 17xxx xx partlist
* see in CT 17xxx xx partlist

	TV ASY A59EHJ43X15 00
	TV ASY A66EHJ43X15 00
	Tube 4/3 25", 28" , MP /Vectorgun
10518330	TV PSD CT 17061 32
CL21	14N0F +3.5% -3.5% 1K5V
CL22	30N0F +5% -5% 400.0V
CL24	470N0F +5% -5% 250.0V
CL24	440N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	CPM 10N0F +10% 63.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL81	0 OHM +0% 100MI0W
JP80	0 OHM +0% 100MI0W
LB02	LF 18U0H +7% -7%
LL05	TF-DST M30FBC3 10546610 3087 A0
LL22	LF 650U0H +5% -5% R 2873 A0 00
LL26	LL 26U5H +10%
LL26	LL 30U5H 2519 A0
RF04	1R21 OHM +1% 700MI0W
RF05	1R0 OHM +1% 700MI0W
RF05	1R21 OHM +1% 700MI0W
RF06	12R1 OHM +1% 100MI0W
RL02	10K0 OHM +5% 100MI0W
RL02	6K04 OHM +1% 100MI0W
RL02	499R0 OHM +1% 100MI0W
RL03	10K0 OHM +1% 100MI0W
RL03	11K5 OHM +1% 100MI0W
RL04	10K0 OHM +1% 100MI0W
RL04	20K0 OHM +1% 100MI0W
RL04	11K5 OHM +1% 100MI0W
RL05	10K0 OHM +1% 100MI0W
RL05	20K0 OHM +1% 100MI0W
RL05	11K5 OHM +1% 100MI0W
RL06	4K75 OHM +1% 100MI0W
RL06	11K5 OHM +1% 100MI0W
RL11	4R7 OHM +10% 250MI0W
RL11	4R7 OHM +5% 250MI0W
RL19	22K0 OHM +5% 100MI0W
RL19	33K0 OHM +5% 100MI0W
RL43	68K1 OHM +1% 250MI0W
RL43	68K1 OHM +1% 250MI0W
RL43	68K1 OHM +1% 100MI0W
RL45	180K0 OHM +5% 100MI0W
RL45	270K0 OHM +5% 100MI0W
RL46	12K0 OHM +5% 100MI0W
RL47	33K0 OHM +5% 100MI0W
RL48	76K8 OHM +1% 100MI0W
RL48	60K4 OHM +1% 100MI0W
RL64	8K25 OHM +1% 100MI0W
RL65	RCF 24K0 OHM +5% 250MI0W
RV20	RMF 33K2 OHM +1% 250MI0W
RV20	33K2 OHM +1% 100MI0W
ZL13	PROTEC MOD MP63 630MI0 A 65.0V

⚠ Indicates critical safety components, and identical components should be used for replacement. Only then can the operational safety be garanteed.

Le remplacement des éléments de sécurité (repérés avec le symbole ⚠) par des composants non homologués selon la Norme CEI 65 entraine la non-conformité de l'appareil.
Dans ce cas, la responsabilité du fabricant n'est plus engagée.

Wenn Sicherheitsteile (mit dem Symbol ⚠ gekennzeichnet) durch nicht normgerechte Teile ersetzt werden, erlischt die Haftung des Herstellers.

La sostituzione degli elementi di sicurezza (contrassegnati con il segno ⚠) con componenti non omologati secondo la norma CEI 65 comporta la non conformitá dell'apparecchio.
In tal caso é "esclusa la responsabilitá" del costruttore.

La subtitución de elementos de seguridad (marcados con el simbolo ⚠) por componentes no homologados segun la norma CEI 65, provoca la no conformidad del aparato.
En ese caso, el fabricante cesa de ser responsable.

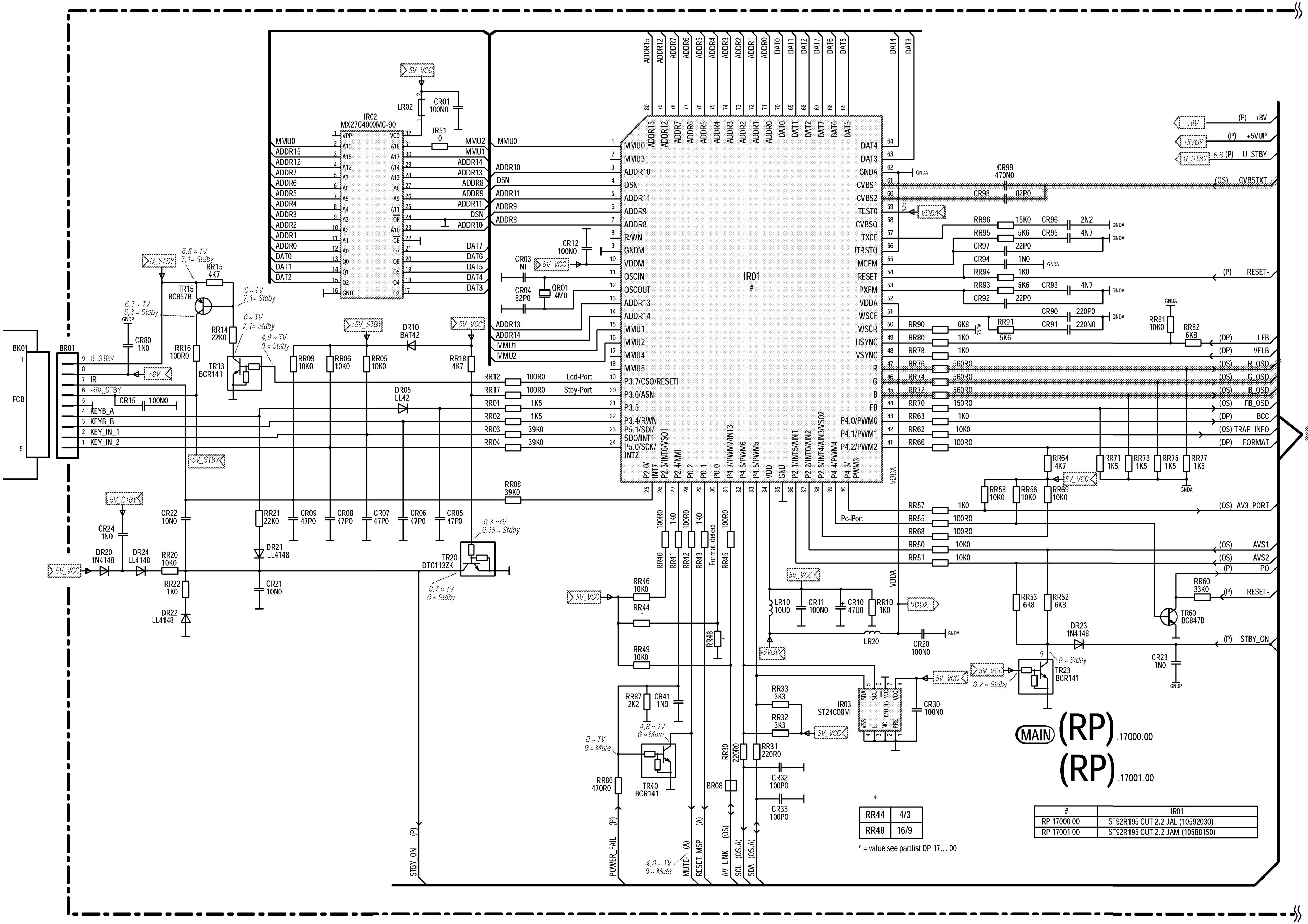
	TV ASY A80AEJ15X01 (A) 00
	Tube 4/3 33" , MP
10575830	TV PSD CT 17062 26
CL21	16N2F +3.5% -3.5% 1K6V
CL22	30N0F +5% -5% 400.0V
CL24	560N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	10N0F +10% 63.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0% 100MI0W
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29 TBD 11
LL22	LF 650U0H +5% -5% R 2873 A0 00
LL26	LL 26U5H +10%
RF05	1R21 OHM +1% 700MI0W
RF06	10R0 OHM +1% 100MI0W
RL02	6K04 OHM +1% 100MI0W
RL03	4K75 OHM +1% 100MI0W
RL04	4K75 OHM +1% 100MI0W
RL05	4K75 OHM +1% 100MI0W
RL06	6K81 OHM +1% 100MI0W
RL19	13K0 OHM +5% 100MI0W
RL45	150K0 OHM +5% 100MI0W
RL48	76K8 OHM +1% 100MI0W
RL49	560K0 OHM +5% 100MI0W
RL65	RCF 4K7 OHM +5% 250MI0W
RV20	RMF 23K7 OHM +1% 250MI0W

	TV ASY A51EFS83X191 03
	Tube 4/3 21" OT
10555770	TV PSD CT 17035 26
CL21	8N3F +3.5% -3.5% 1K6V
CL22	33N0F +5% -5% 1K0V
CL24	440N0F +5% -5% 250.0V
CL41	1N0F +10% -10% 50.0V
DL71	D-ZENER BZX55C24 24V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0% 100MI0W
LB02	LF 18U0H +7% -7%
LL05	TF-DST M30FBC3 10555640 3087 A0
LL22	LF 650U0H +5% -5% R 2873 A0 00
LL26	LL 85U0H 2519 A0
RF05	1R5 OHM +1% 700MI0W
RF06	10R0 OHM +1% 100MI0W
RL02	6K04 OHM +1% 100MI0W
RL03	10K0 OHM +1% 100MI0W
RL04	10K0 OHM +1% 100MI0W
RL05	10K0 OHM +1% 100MI0W
RL06	3K32 OHM +1% 100MI0W
RL45	110K0 OHM +5% 100MI0W
RL49	60K4 OHM +1% 100MI0W
RL65	4K7 OHM +5% 250MI0W
RV20	23K7 OHM +1% 250MI0W

	TV ASY A59EGD048X30 19
	TV ASY A68EGD038X30 (A) 68 00
	Tube 4/3 25" SF, 29" SF
10515520	TV PSD CT 17071 26
CL21	16N2F +3.5% -3.5% 1K6V
CL22	30N0F +5% -5% 400.0V
CL24	510N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	10N0F +10% 63.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0% 100MI0W
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29 TBD 13
LL22	LF 650U0H +5% -5%
LL26	LL 26U5H +10%
RF05	RMF 1R0 OHM +1% 700MI0W
RL02	6K8 OHM +5% 100MI0W
RL03	4K75 OHM +1% 100MI0W
RL04	4K75 OHM +1% 100MI0W
RL05	4K75 OHM +1% 100MI0W
RL06	4K75 OHM +1% 100MI0W
RL19	15K0 OHM +5% 100MI0W
RL45	180K0 OHM +5% 100MI0W
RL48	100K0 OHM +5% 100MI0W
RL49	300K0 OHM +5% 100MI0W
RL65	4K7 OHM +5% 250MI0W
RV20	33K2 OHM +1% 250MI0W

	TV ASY W56EGV023X015 56 01
	TV ASY W66EGV023X015 66 00
	TV ASY W76EGV023X015 (A) 00
	Tube 16/9 24", 28",32", SF / vectorgun
10515530	TV PSD CT 17083 38
CL21	15N5F +3.5% -3.5% 1K6V
CL22	27N0F +5% -5% 400.0V
CL24	440N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	100N0F +5% 63.0V
CL51	290N0F +5% -5% 250.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55C24 24V 500MI0W
JL60	WIREBARE 22
JL82	0 OHM +0% 100MI0W
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29 15314460 10
LL22	LF 650U0H +5% -5%
LL26	LL 30U5H 2519 A0
RF05	1R21 OHM +1% 700MI0W
RL02	4K99 OHM +1% 100MI0W
RL03	6K49 OHM +1% 100MI0W
RL04	6K49 OHM +1% 100MI0W
RL05	6K49 OHM +1% 100MI0W
RL06	2K37 OHM +1% 100MI0W
RL19	13K0 OHM +5% 100MI0W
RL45	390K0 OHM +5% 100MI0W
RL48	220K0 OHM +5% 100MI0W
RL49	180K0 OHM +5% 100MI0W
RL65	47K0 OHM +5% 250MI0W
RV20	100K0 OHM +1% 250MI0W

CONTROL MICROPROCESSOR - MICROPROCESSEUR DE COMMANDE - MIKROPROZESSOR - MICROPROCESSORE DEI COMANDI - MICROPROCESADOR DE LOS MANDOS



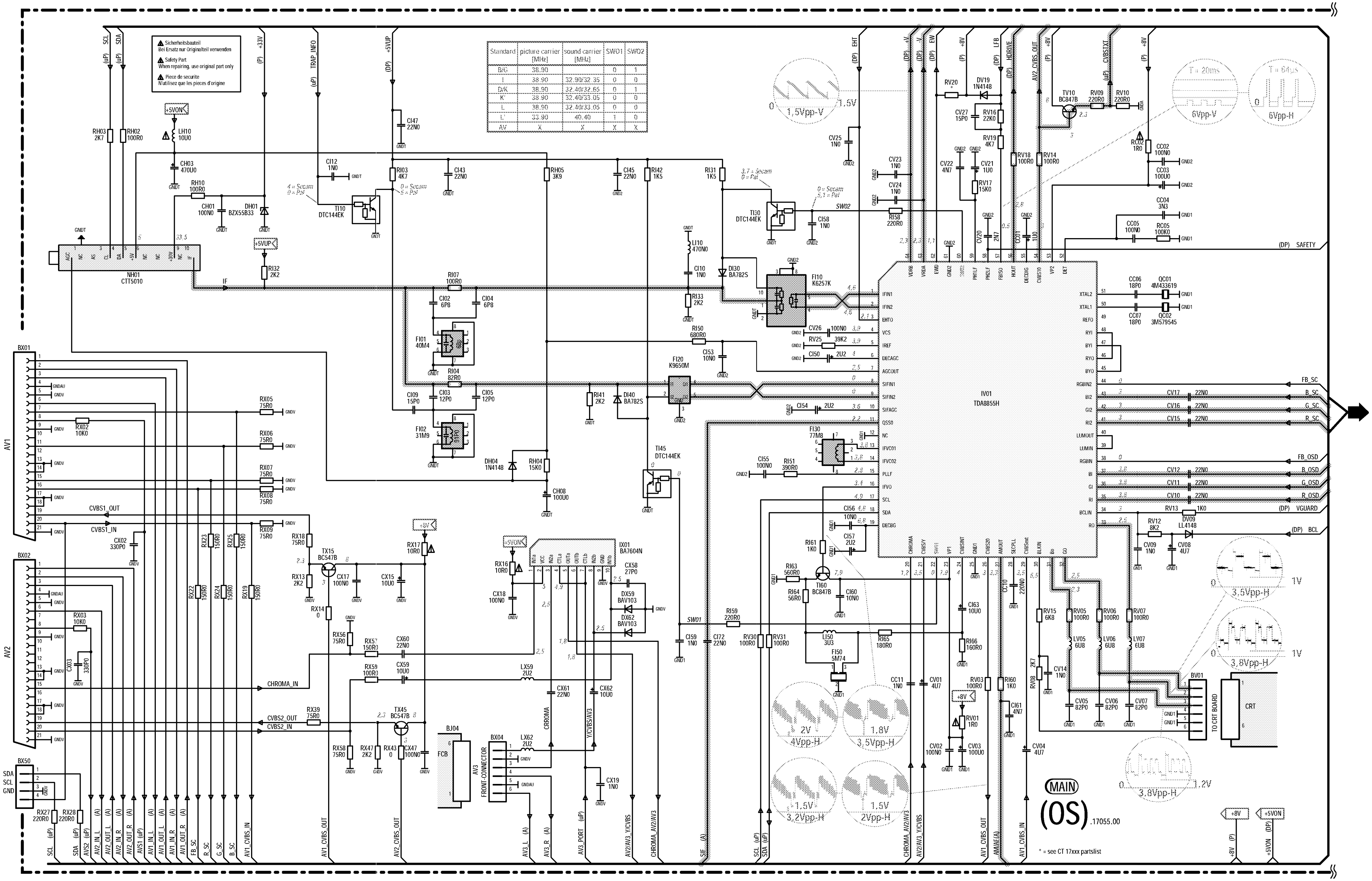
IR01
IR02
MX27C4000MC-90
IR03
ST24C08M
5V_VCC
+5V_STBY
U_STBY
+8V
+5VUP
VDDA
GNDA
BK01
BR01
FCB
9 U_STBY
8
7 IR
6 +5V_STBY
5
4 KEYB_A
3 KEYB_B
2 KEY_IN_1
1 KEY_IN_2
TR15
BC857B
TR13
BCR141
TR20
DTC113ZK
TR40
BCR141
TR23
BCR141
TR60
BC847B
QR01
4M0
DR10
BAT42
DR05
LL42
DR20
1N4148
DR24
LL4148
DR21
LL4148
DR22
LL4148
DR23
1N4148
LR02
LR10
10U0
LR20
BR08
MMU0
MMU1
MMU2
MMU3
MMU4
MMU5
ADDR8
ADDR9
ADDR10
ADDR11
ADDR13
ADDR14
DSN
R/WN
GNDM
VDDM
OSCIN
OSCOUT
P3.7/CSO/RESETI
P3.6/ASN
P3.5
P3.4/RWN
P5.1/SDI/SDO/INT1
P5.0/SCK/INT2
Led-Port
Stby-Port
Po-Port
Format-detect
DAT4
DAT3
GNDA
CVBS1
CVBS2
TEST0
CVBSO
TXCF
JTRSTO
MCFM
RESET
PXFM
VDDA
WSCF
WSCR
HSYNC
VSYNC
R
G
B
FB
P4.0/PWM0
P4.1/PWM1
P4.2/PWM2
(P) +8V
(P) +5VUP
(P) U_STBY
(OS) CVBSTXT
(P) RESET-
(DP) LFB
(DP) VFLB
(OS) R_OSD
(OS) G_OSD
(OS) B_OSD
(OS) FB_OSD
(DP) BCC
(OS) TRAP_INFO
(DP) FORMAT
(OS) AV3_PORT
(OS) AVS1
(OS) AVS2
(P) PO
(P) STBY_ON
STBY_ON (P)
POWER_FAIL (P)
MUTE- (A)
RESET_MSP- (A)
AV_LINK (OS)
SCL (OS,A)
SDA (OS,A)
6,8 = TV
7,1= Stdby
0 = TV
0 = Mute
4,8 = TV
0 = Stdby
0,3 = TV
0,15 = Stdby
0,7 = TV
0.2 = Stdby
MAIN (RP).17000.00
(RP).17001.00

RR44	4/3
RR48	16/9

* = value see partlist DP 17… 00

#	IR01
RP 17000 00	ST92R195 CUT 2.2 JAL (10592030)
RP 17001 00	ST92R195 CUT 2.2 JAM (10588150)

RF/FI/ SCART INTERFACE/VIDEO SIGNAL PROCESSING -HF/FI INTERFACE PERITELEVISION/TRAITEMENT LUMINANCE CHROMINANCE - HF/ZF/ SCART INTERFACE/VIDEO SIGNALVERARBEITUNG - RF/FI /PRESA PERITEL/ELABORAZIONE VIDEO - RF/FI /EUROCONECTOR / TRATAMENTO VIDEO



NH01 CTT5010
IF
BX01
AV1
BX02
AV2
BX50
SDA
SCL
GND
CVBS1_OUT
CVBS1_IN
CVBS2_OUT
CVBS2_IN
CHROMA_IN
FI01 40M4
FI02 31M9
FI10 K6257K
FI20 K9650M
FI30 77M8
FI50 5M74
TI10 DTC144EK
TI30 DTC144EK
TI45 DTC144EK
TI60 BC847B
TX15 BC547B
TX45 BC547B
TV10 BC847B
IX01 BA7604N
IV01 TDA8855H
QC01 4M433619
QC02 3M579545
BJ04 FCB
BX04 AV3 FRONT-CONNECTOR
BV01
TO CRT BOARD
CRT
FB_SC
R_SC
G_SC
B_SC
FB_OSD
R_OSD
G_OSD
B_OSD
VGUARD
BCL
SAFETY
EHT
EW
HORIVE
AV2_CVBS_OUT
TRAP_INFO
+33V
+5VUP
+5VON
+8V
SW01
SW02
4 = Secam
0 = Pal
0 = Secam
5 = Pal
3,7 = Secam
0 = Pal
1,5Vpp-V
1,5V
6Vpp-V
6Vpp-H
T = 20ms
T = 64µs
3,5Vpp-H
3,8Vpp-H
1V
2V
4Vpp-H
1,8V
3,5Vpp-H
1,5V
3,2Vpp-H
2Vpp-H
3,8Vpp-H
1,2V
MAIN
(OS)
.17055.00
* = see CT 17xxx partslist

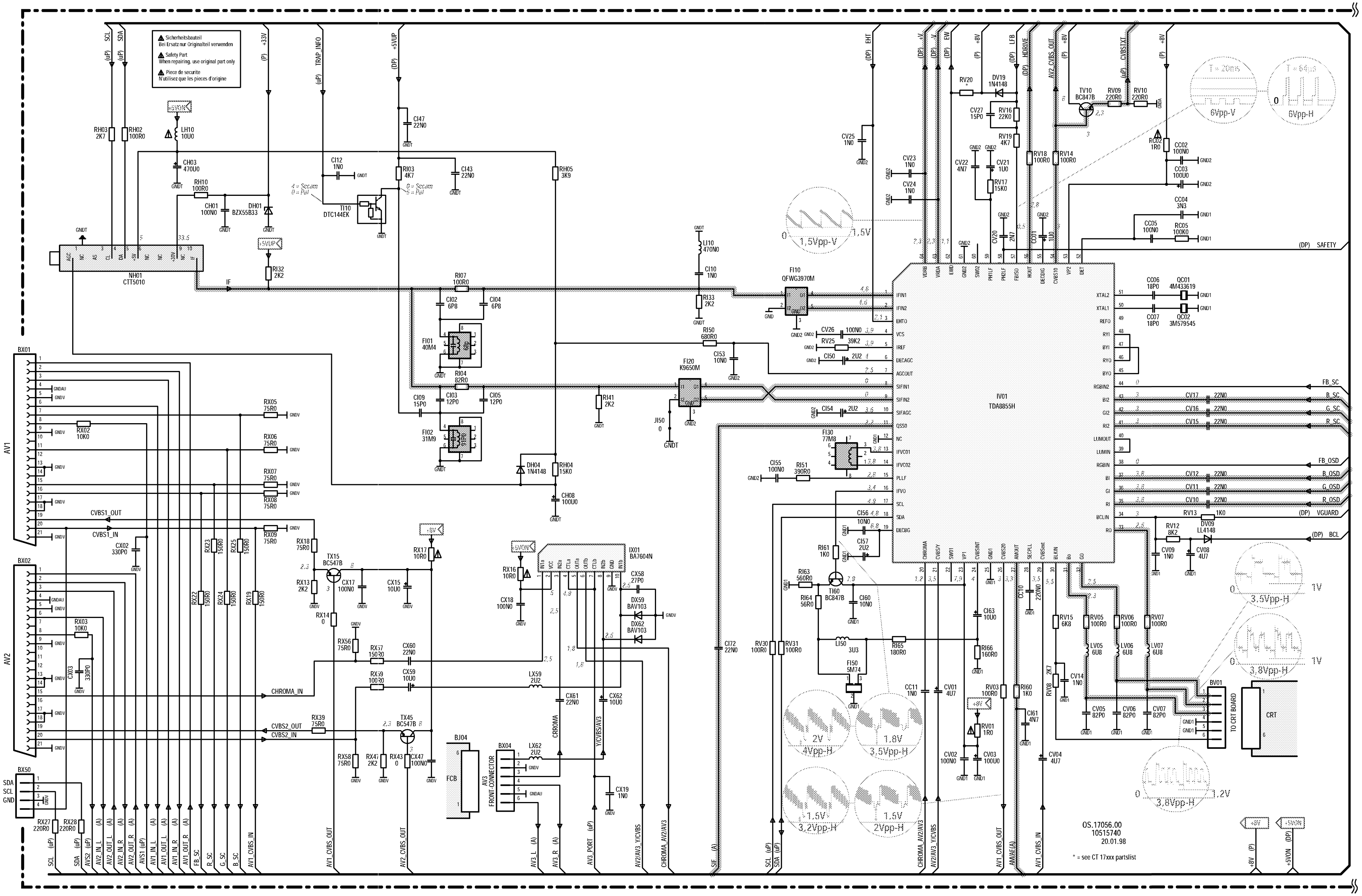
⚠ Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden

⚠ Safety Part
When repairing, use original part only

⚠ Piece de securite
N'utilisez que les pieces d'origine

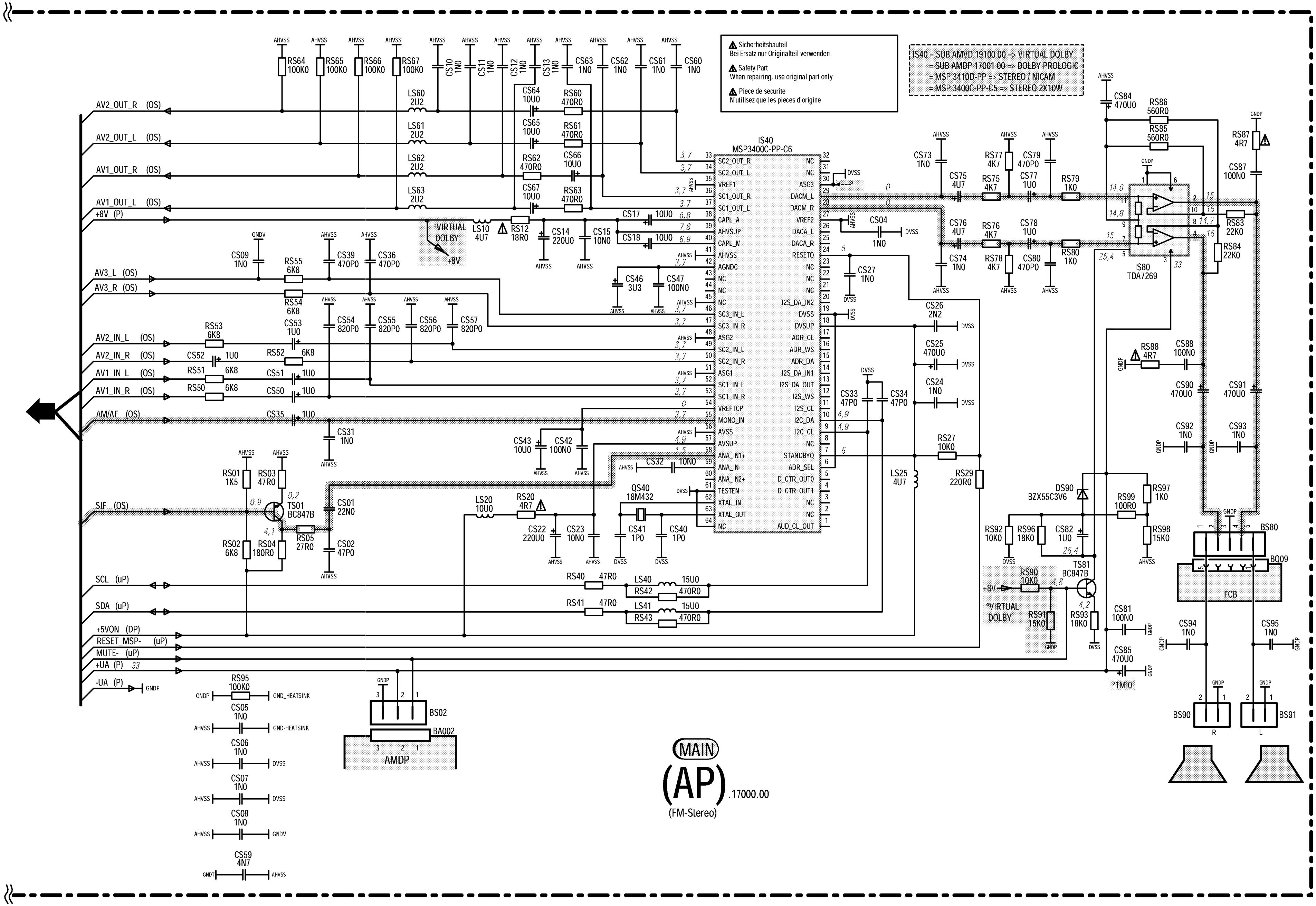
Standard	picture carrier [MHz]	sound carrier [MHz]	SW01	SW02
B/G	38.90		0	1
I	38.90	32.90/32.35	0	0
D/K	38.90	32.40/32.65	0	1
K'	38.90	32.40/33.05	0	0
L	38.90	32.40/33.05	0	0
L'	33.90	40.40	1	0
AV	X	X	X	X

RF/FI/ SCART INTERFACE/VIDEO SIGNAL PROCESSING -HF/FI INTERFACE PERITELEVISION/TRAITEMENT LUMINANCE CHROMINANCE - HF/ZF/ SCART INTERFACE/VIDEO SIGNALVERARBEITUNG - RF/FI /PRESA PERITEL/ELABORAZIONE VIDEO - RF/FI /EUROCONECTOR/TRATAMENTO VIDEO



Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden
Safety Part
When repairing, use original part only
Piece de securite
N'utilisez que les pieces d'origine
NH01
CTT5010
IF
FI10
QFWG3970M
FI20
K9650M
FI01
40M4
FI02
31M9
FI30
77M8
FI50
5M74
IV01
TDA8855H
IX01
BA7604N
TI10
DTC144EK
TX15
BC547B
TX45
BC547B
TI60
BC847B
TV10
BC847B
DH01
BZX55B33
DH04
1N4148
DV19
1N4148
DV09
LL4148
DX59
BAV103
DX62
BAV103
QC01
4M433619
QC02
3M579545
BX01
AV1
BX02
AV2
BX50
BX04
AV3
FRONT-CONNECTOR
BJ04
FCB
BV01
TO CRT BOARD
CRT
CVBS1_OUT
CVBS1_IN
CHROMA_IN
CVBS2_OUT
CVBS2_IN
SDA
SCL
GND
(DP) SAFETY
FB_SC
B_SC
G_SC
R_SC
FB_OSD
B_OSD
G_OSD
R_OSD
(DP) VGUARD
(DP) BCL
(DP) EHT
(DP) -V
(DP) V
(DP) EW
(P) +8V
(DP) LFB
(DP) HDRIVE
AV2_CVBS_OUT
(P) +8V
(uP) CVBSTXT
(P) +8V
(P) +33V
(uP) TRAP_INFO
(DP) +5VUP
(uP) SCL
(uP) SDA
AV1_CVBS_OUT
AV2_CVBS_OUT
AV3_L (A)
AV3_R (A)
AV3_PORT (uP)
AV2/AV3_Y/CVBS
CHROMA_AV2/AV3
SIF (A)
SCL (uP)
SDA (uP)
CHROMA_AV2/AV3
AV2/AV3_Y/CVBS
AV1_CVBS_OUT
AM/AE(A)
AV1_CVBS_IN
SCL (uP)
SDA (uP)
AVS2 (uP)
AV2_IN_L (A)
AV2_OUT_L (A)
AV2_IN_R (A)
AV2_OUT_R (A)
AVS1 (uP)
AV1_IN_L (A)
AV1_OUT_L (A)
AV1_IN_R (A)
AV1_OUT_R (A)
FB_SC
R_SC
G_SC
B_SC
AV1_CVBS_IN
+8V (P)
+5VON (DP)
1,5Vpp-V
1,5V
6Vpp-V
6Vpp-H
T = 20ms
T = 64µs
3,5Vpp-H
1V
3,8Vpp-H
1V
3,8Vpp-H
1,2V
2V
4Vpp-H
1,8V
3,5Vpp-H
1,5V
3,2Vpp-H
1,5V
2Vpp-H
4 = Secam
0 = Pal
0 = Secam
5 = Pal
OS.17056.00
10515740
20.01.98
* = see CT 17xxx partslist

AMPLIFIER SCHEMATIC DIAGRAM - SCHEMA DE L'AMPLIFICATEUR - SCHALTBILD AUDIO-SIGNALVERABEITUNG - SCHEMA DELL' AMPLIFICATORE
ESQUEMA DEL AMPLIFICADOR
(STEREO)



⚠ Sicherheitsbauteil
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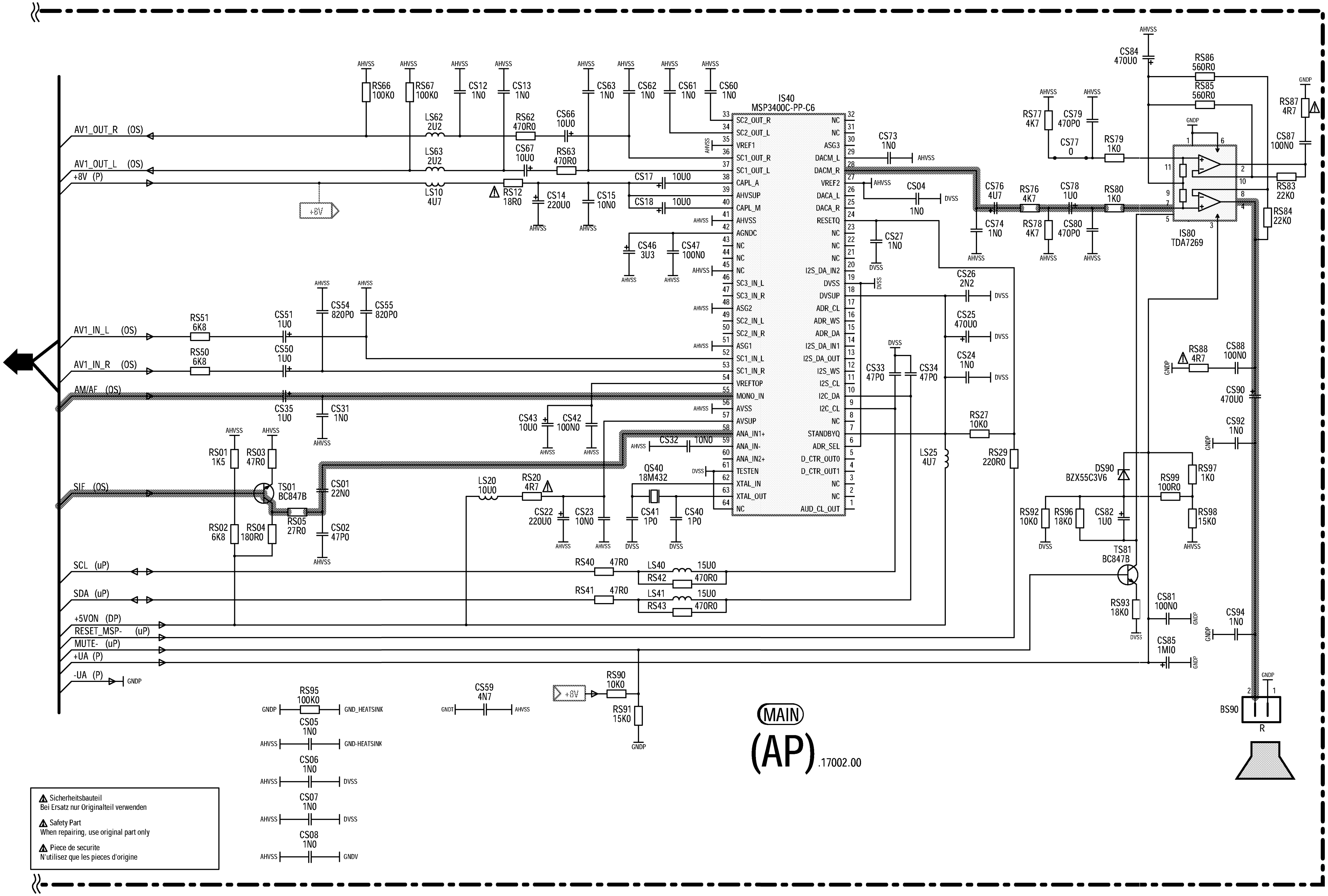
N'utilisez que les pieces d'origine

IS40 = SUB AMVD 19100 00 => VIRTUAL DOLBY
= SUB AMDP 17001 00 => DOLBY PROLOGIC
= MSP 3410D-PP => STEREO / NICAM
= MSP 3400C-PP-C5 => STEREO 2X10W

AV2_OUT_R (OS)
AV2_OUT_L (OS)
AV1_OUT_R (OS)
AV1_OUT_L (OS)
+8V (P)
AV3_L (OS)
AV3_R (OS)
AV2_IN_L (OS)
AV2_IN_R (OS)
AV1_IN_L (OS)
AV1_IN_R (OS)
AM/AF (OS)
SIF (OS)
SCL (uP)
SDA (uP)
+5VON (DP)
RESET_MSP- (uP)
MUTE- (uP)
+UA (P) 33
-UA (P)
GNDP
RS64 100K0
RS65 100K0
RS66 100K0
RS67 100K0
CS10 1N0
CS11 1N0
CS12 1N0
CS13 1N0
CS63 1N0
CS62 1N0
CS61 1N0
CS60 1N0
AHVSS
LS60 2U2
LS61 2U2
LS62 2U2
LS63 2U2
CS64 10U0
RS60 470R0
CS65 10U0
RS61 470R0
RS62 470R0
CS66 10U0
CS67 10U0
RS63 470R0
°VIRTUAL DOLBY
+8V
LS10 4U7
RS12 18R0
CS14 220U0
CS15 10N0
CS17 10U0
CS18 10U0
CS09 1N0
GNDV
RS55 6K8
CS39 470P0
CS36 470P0
RS54 6K8
CS46 3U3
CS47 100N0
RS53 6K8
CS53 1U0
CS54 820P0
CS55 820P0
CS56 820P0
CS57 820P0
CS52 1U0
RS52 6K8
RS51 6K8
CS51 1U0
RS50 6K8
CS50 1U0
CS35 1U0
CS31 1N0
CS43 10U0
CS42 100N0
CS32 10N0
RS01 1K5
RS03 47R0
TS01 BC847B
CS01 22N0
RS02 6K8
RS04 180R0
RS05 27R0
CS02 47P0
LS20 10U0
RS20 4R7
CS22 220U0
CS23 10N0
QS40 18M432
CS41 1P0
CS40 1P0
DVSS
RS40 47R0
LS40 15U0
RS42 470R0
RS41 47R0
LS41 15U0
RS43 470R0
IS40
MSP3400C-PP-C6
33 SC2_OUT_R
34 SC2_OUT_L
35 VREF1
36 SC1_OUT_R
37 SC1_OUT_L
38 CAPL_A
39 AHVSUP
40 CAPL_M
41 AHVSS
42 AGNDC
43 NC
44 NC
45 NC
46 SC3_IN_L
47 SC3_IN_R
48 ASG2
49 SC2_IN_L
50 SC2_IN_R
51 ASG1
52 SC1_IN_L
53 SC1_IN_R
54 VREFTOP
55 MONO_IN
56 AVSS
57 AVSUP
58 ANA_IN1+
59 ANA_IN-
60 ANA_IN2+
61 TESTEN
62 XTAL_IN
63 XTAL_OUT
64 NC
32 NC
31 NC
30 ASG3
29 DACM_L
28 DACM_R
27 VREF2
26 DACA_L
25 DACA_R
24 RESETQ
23 NC
22 NC
21 NC
20 I2S_DA_IN2
19 DVSS
18 DVSUP
17 ADR_CL
16 ADR_WS
15 ADR_DA
14 I2S_DA_IN1
13 I2S_DA_OUT
12 I2S_WS
11 I2S_CL
10 I2C_DA
9 I2C_CL
8 NC
7 STANDBYQ
6 ADR_SEL
5 D_CTR_OUT0
4 D_CTR_OUT1
3 NC
2 NC
1 AUD_CL_OUT
CS04 1N0
CS27 1N0
CS26 2N2
CS25 470U0
CS24 1N0
CS33 47P0
CS34 47P0
RS27 10K0
RS29 220R0
LS25 4U7
CS73 1N0
CS75 4U7
RS77 4K7
CS79 470P0
RS75 4K7
CS77 1U0
RS79 1K0
CS76 4U7
RS76 4K7
CS78 1U0
RS80 1K0
CS74 1N0
RS78 4K7
CS80 470P0
CS84 470U0
RS86 560R0
RS85 560R0
IS80 TDA7269
RS87 4R7
CS87 100N0
RS83 22K0
RS84 22K0
RS88 4R7
CS88 100N0
CS90 470U0
CS91 470U0
CS92 1N0
CS93 1N0
DS90 BZX55C3V6
RS99 100R0
RS97 1K0
RS92 10K0
RS96 18K0
CS82 1U0
RS98 15K0
TS81 BC847B
RS90 10K0
RS91 15K0
RS93 18K0
CS81 100N0
CS85 470U0
°1MI0
BS80
BQ09
FCB
CS94 1N0
CS95 1N0
BS90
BS91
R
L
RS95 100K0
GND_HEATSINK
CS05 1N0
CS06 1N0
CS07 1N0
CS08 1N0
CS59 4N7
GNDT
BS02
BA002
AMDP
MAIN
(AP) .17000.00
(FM-Stereo)

AMPLIFIER SCHEMATIC DIAGRAM - SCHEMA DE L'AMPLIFICATEUR - SCHALTBILD AUDIO-SIGNALVERABEITUNG - SCHEMA DELL' AMPLIFICATORE - ESQUEMA DEL AMPLIFICADOR

(MONO)



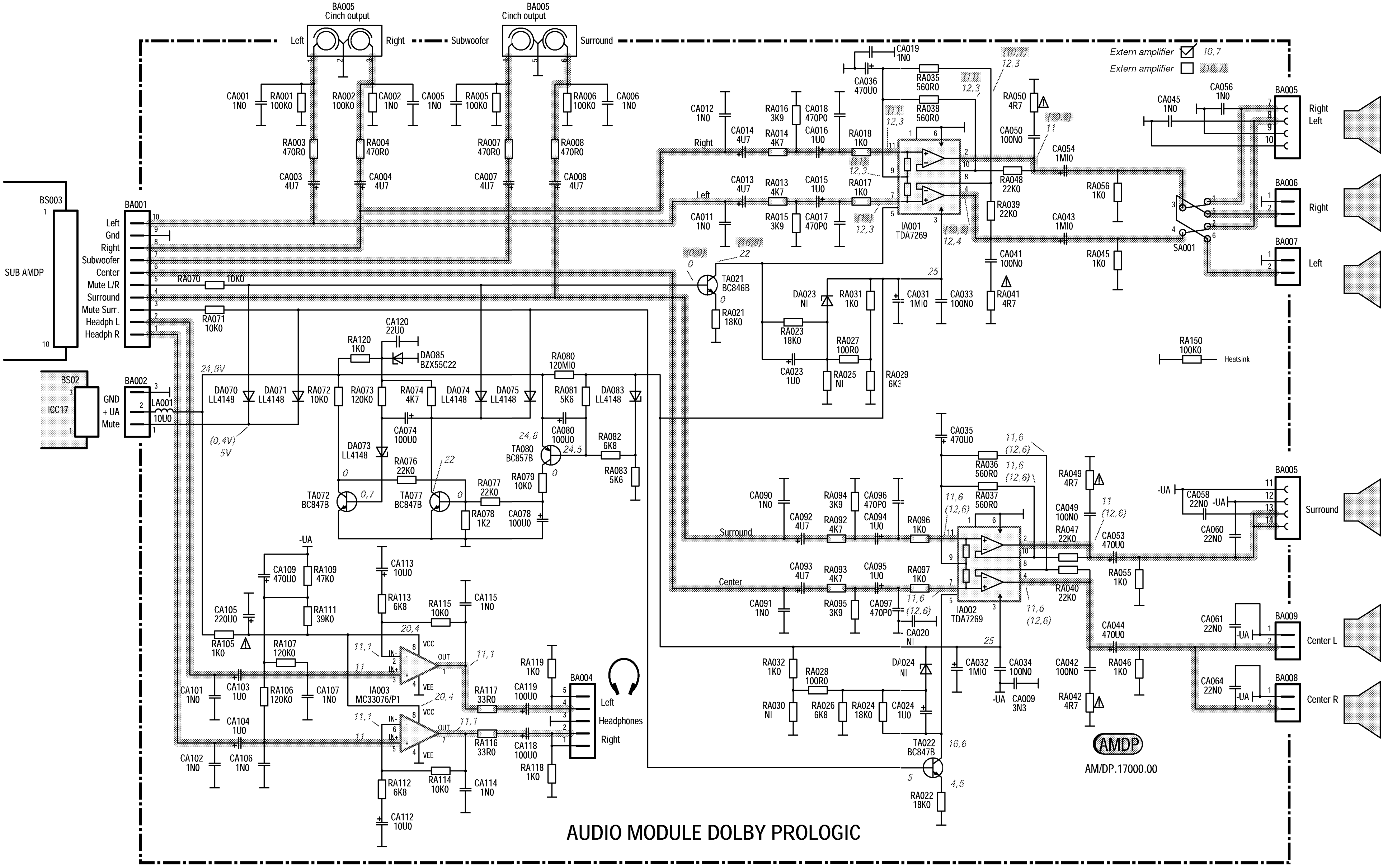
AV1_OUT_R (OS)
AV1_OUT_L (OS)
+8V (P)
AV1_IN_L (OS)
AV1_IN_R (OS)
AM/AF (OS)
SIF (OS)
SCL (uP)
SDA (uP)
+5VON (DP)
RESET_MSP- (uP)
MUTE- (uP)
+UA (P)
-UA (P)
GNDP
IS40
MSP3400C-PP-C6
IS80
TDA7269
RS66 100K0
RS67 100K0
CS12 1N0
CS13 1N0
CS63 1N0
CS62 1N0
CS61 1N0
CS60 1N0
LS62 2U2
LS63 2U2
LS10 4U7
RS62 470R0
CS66 10U0
CS67 10U0
RS63 470R0
RS12 18R0
CS14 220U0
CS15 10N0
CS17 10U0
CS18 10U0
CS46 3U3
CS47 100N0
CS54 820P0
CS55 820P0
RS51 6K8
RS50 6K8
CS51 1U0
CS50 1U0
CS35 1U0
CS31 1N0
CS43 10U0
CS42 100N0
CS32 10N0
RS01 1K5
RS03 47R0
TS01 BC847B
RS05 27R0
CS01 22N0
RS02 6K8
RS04 180R0
CS02 47P0
LS20 10U0
RS20 4R7
CS22 220U0
CS23 10N0
QS40 18M432
CS41 1P0
CS40 1P0
RS40 47R0
RS41 47R0
LS40 15U0
LS41 15U0
RS42 470R0
RS43 470R0
CS73 1N0
CS04 1N0
CS27 1N0
CS26 2N2
CS25 470U0
CS24 1N0
CS33 47P0
CS34 47P0
LS25 4U7
RS27 10K0
RS29 220R0
CS76 4U7
CS74 1N0
RS76 4K7
RS78 4K7
CS78 1U0
CS80 470P0
RS80 1K0
RS77 4K7
CS79 470P0
CS77 0
RS79 1K0
CS84 470U0
RS86 560R0
RS85 560R0
RS87 4R7
CS87 100N0
RS83 22K0
RS84 22K0
RS88 4R7
CS88 100N0
CS90 470U0
CS92 1N0
DS90 BZX55C3V6
RS99 100R0
RS97 1K0
RS98 15K0
RS92 10K0
RS96 18K0
CS82 1U0
TS81 BC847B
RS93 18K0
CS81 100N0
CS85 1MI0
CS94 1N0
BS90
R
RS90 10K0
RS91 15K0
CS59 4N7
RS95 100K0
CS05 1N0
CS06 1N0
CS07 1N0
CS08 1N0
GND_HEATSINK
GND-HEATSINK
AHVSS
DVSS
GNDV
GNDT
+8V
MAIN
(AP) .17002.00

⚠ Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden

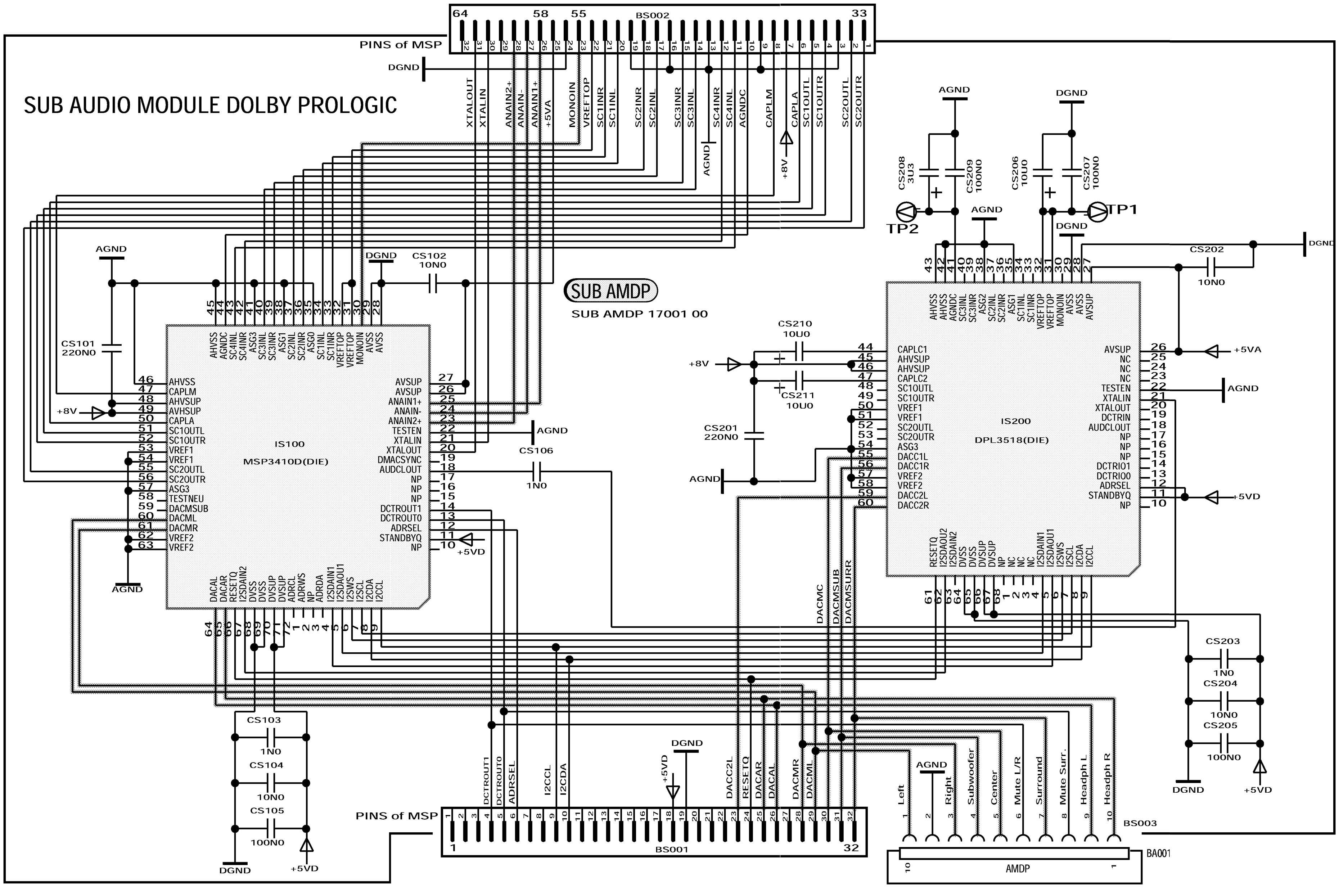
⚠ Safety Part
When repairing, use original part only

⚠ Piece de securite
N'utilisez que les pieces d'origine

AUDIO SIGNAL MODULE DOLBY PROLOGIC - MODULE AUDIO DOLBY PROLOGIC - DOLBY PROLOGIC VERSTÄRKER - MODULO AUDIO DOLBY PROLOGIC
ESQUEMA DEL MÕDULO AMPLIFICADOR DE AUDIO

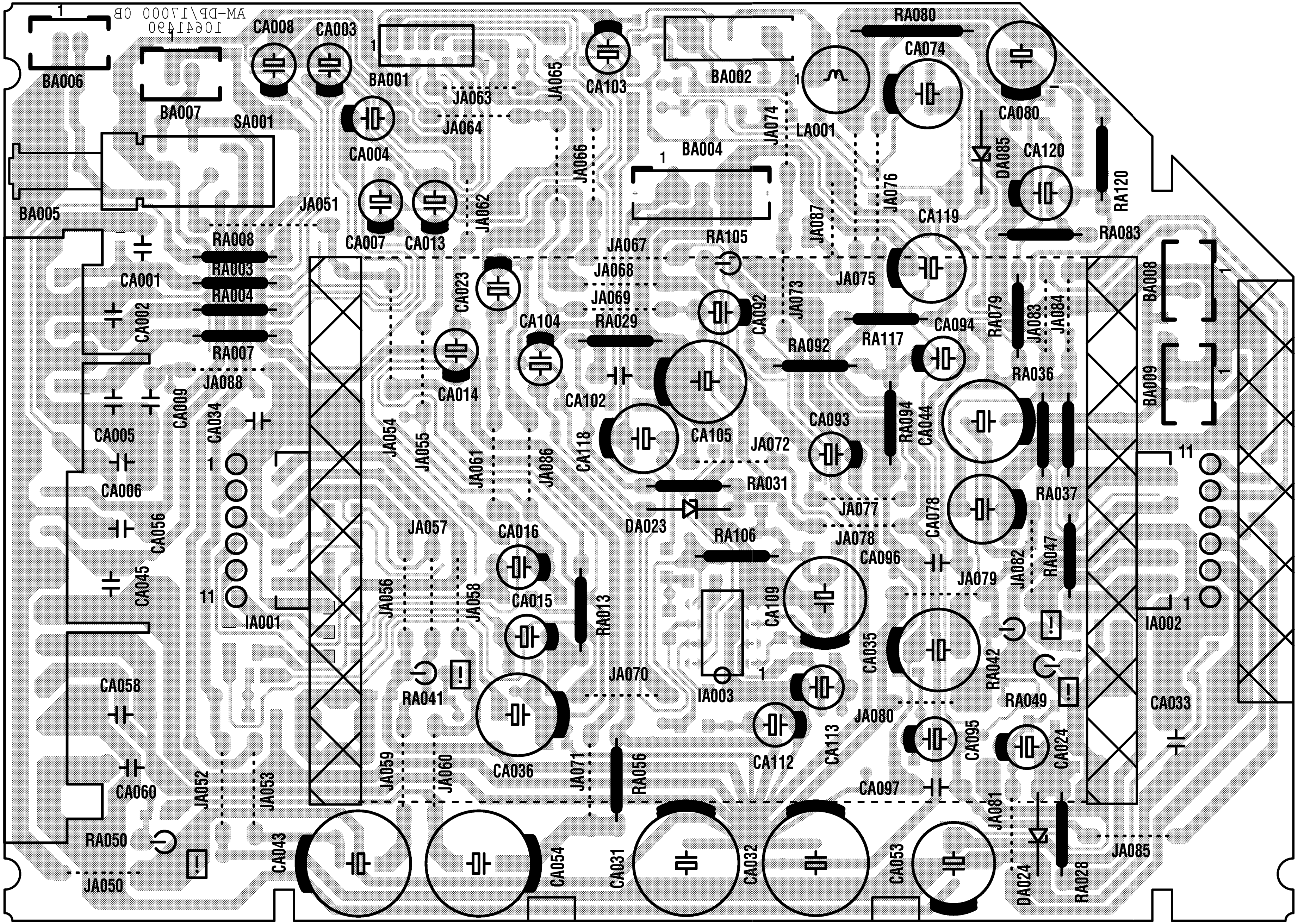

AUDIO MODULE DOLBY PROLOGIC
AM/DP.17000.00
AMDP
BA005 Cinch output
Left
Right
Subwoofer
Surround
BS003
SUB AMDP
BA001
Left
Gnd
Right
Subwoofer
Center
Mute L/R
Surround
Mute Surr.
Headph L
Headph R
BS02
ICC17
BA002
GND
+ UA
Mute
LA001 10U0
CA001 1N0
RA001 100K0
RA002 100K0
CA002 1N0
CA005 1N0
RA005 100K0
RA006 100K0
CA006 1N0
RA003 470R0
RA004 470R0
RA007 470R0
RA008 470R0
CA003 4U7
CA004 4U7
CA007 4U7
CA008 4U7
RA070 10K0
RA071 10K0
CA120 22U0
RA120 1K0
DA085 BZX55C22
RA080 120MI0
DA070 LL4148
DA071 LL4148
RA072 10K0
RA073 120K0
RA074 4K7
DA074 LL4148
DA075 LL4148
RA081 5K6
DA083 LL4148
CA074 100U0
CA080 100U0
RA082 6K8
DA073 LL4148
RA076 22K0
TA080 BC857B
RA083 5K6
RA079 10K0
TA072 BC847B
TA077 BC847B
RA077 22K0
RA078 1K2
CA078 100U0
24,8V
(0,4V) 5V
-UA
CA109 470U0
RA109 47K0
RA111 39K0
CA113 10U0
RA113 6K8
RA115 10K0
CA115 1N0
CA105 220U0
RA105 1K0
RA107 120K0
IA003 MC33076/P1
CA101 1N0
CA103 1U0
RA106 120K0
CA107 1N0
CA104 1U0
CA102 1N0
CA106 1N0
RA119 1K0
RA117 33R0
CA119 100U0
RA116 33R0
CA118 100U0
RA118 1K0
RA112 6K8
RA114 10K0
CA114 1N0
CA112 10U0
BA004
Left
Headphones
Right
CA019 1N0
CA036 470U0
RA035 560R0
RA038 560R0
CA012 1N0
RA016 3K9
CA018 470P0
CA014 4U7
RA014 4K7
CA016 1U0
RA018 1K0
CA013 4U7
RA013 4K7
CA015 1U0
RA017 1K0
CA011 1N0
RA015 3K9
CA017 470P0
IA001 TDA7269
RA050 4R7
CA050 100N0
CA054 1MI0
RA048 22K0
RA039 22K0
CA043 1MI0
CA041 100N0
RA041 4R7
RA056 1K0
RA045 1K0
TA021 BC846B
RA021 18K0
DA023 NI
RA031 1K0
CA031 1MI0
CA033 100N0
RA023 18K0
RA027 100R0
CA023 1U0
RA025 NI
RA029 6K3
Extern amplifier ☑ 10,7
Extern amplifier ☐ (10,7)
CA045 1N0
CA056 1N0
SA001
BA005
BA006
BA007
RA150 100K0
Heatsink
CA035 470U0
RA036 560R0
RA037 560R0
CA090 1N0
RA094 3K9
CA096 470P0
CA092 4U7
RA092 4K7
CA094 1U0
RA096 1K0
CA093 4U7
RA093 4K7
CA095 1U0
RA097 1K0
CA091 1N0
RA095 3K9
CA097 470P0
CA020 NI
IA002 TDA7269
RA049 4R7
CA049 100N0
RA047 22K0
CA053 470U0
RA040 22K0
RA055 1K0
CA058 22N0
CA060 22N0
CA061 22N0
CA064 22N0
BA009 Center L
BA008 Center R
CA044 470U0
CA042 100N0
RA046 1K0
RA042 4R7
RA032 1K0
RA028 100R0
DA024 NI
CA032 1MI0
CA034 100N0
CA009 3N3
RA030 NI
RA026 6K8
RA024 18K0
CA024 1U0
TA022 BC847B
RA022 18K0
Surround
Center

SUB AUDIO SIGNAL MODULE - SUB MODULE AUDIO - AUDIO SIGNAL SUBMODUL - SUB MODULO AUDIO


SUB AUDIO MODULE DOLBY PROLOGIC
BS002
PINS of MSP
64
58
55
33
DGND
XTALOUT
XTALIN
ANAIN2+
ANAIN-
ANAIN1+
+5VA
MONOIN
VREFTOP
SC1INR
SC1INL
SC2INR
SC2INL
SC3INR
SC3INL
SC4INR
SC4INL
AGNDC
CAPLM
CAPLA
SC1OUTL
SC1OUTR
SC2OUTL
SC2OUTR
AGND
+8V
AGND
CS101
220N0
+8V
DGND
CS102
10N0
IS100
MSP3410D(DIE)
AHVSS
AGNDC
SC4INL
SC4INR
ASG3
SC3INL
SC3INR
ASG1
SC2INL
SC2INR
ASG0
SC1INL
SC1INR
VREFTOP
VREFTOP
MONOIN
AVSS
AVSS
AHVSS
CAPLM
AHVSUP
AVHSUP
CAPLA
SC1OUTL
SC1OUTR
VREF1
VREF1
SC2OUTL
SC2OUTR
ASG3
TESTNEU
DACMSUB
DACML
DACMR
VREF2
VREF2
AVSUP
AVSUP
ANAIN1+
ANAIN-
ANAIN2+
TESTEN
XTALIN
XTALOUT
DMACSYNC
AUDCLOUT
NP
DCTROUT1
DCTROUT0
ADRSEL
STANDBYQ
DACAL
DACAR
RESETQ
I2SDAIN2
DVSS
DVSUP
ADRCL
ADRWS
ADRDA
I2SDAIN1
I2SDAOU1
I2SWS
I2SCL
I2CDA
I2CCL
AGND
CS106
1N0
+5VD
AGND
SUB AMDP
SUB AMDP 17001 00
AGND
DGND
CS208
3U3
CS209
100N0
CS206
10U0
CS207
100N0
TP2
TP1
AGND
DGND
CS202
10N0
DGND
CS210
10U0
+8V
CS211
10U0
CS201
220N0
AGND
IS200
DPL3518(DIE)
CAPLC1
AHVSUP
CAPLC2
SC1OUTL
SC1OUTR
VREF1
SC2OUTL
SC2OUTR
ASG3
DACC1L
DACC1R
VREF2
DACC2L
DACC2R
AGNDC
SC3INL
SC3INR
ASG2
SC2INL
SC2INR
ASG1
SC1INL
SC1INR
VREFTOP
MONOIN
AVSS
AVSUP
NC
TESTEN
XTALIN
XTALOUT
DCTRIN
AUDCLOUT
DCTRIO1
DCTRIO0
ADRSEL
STANDBYQ
+5VA
AGND
+5VD
RESETQ
I2SDAOU2
I2SDAIN2
DVSS
DVSUP
I2SDAIN1
I2SDAOU1
I2SWS
I2SCL
I2CDA
I2CCL
DACMC
DACMSUB
DACMSURR
CS203
1N0
CS204
10N0
CS205
100N0
DGND
+5VD
CS103
1N0
CS104
10N0
CS105
100N0
DGND
+5VD
DCTROUT1
DCTROUT0
ADRSEL
I2CCL
I2CDA
DGND
+5VD
DACC2L
RESETQ
DACAR
DACAL
DACMR
DACML
PINS of MSP
BS001
1
32
AGND
Left
Right
Subwoofer
Center
Mute L/R
Surround
Mute Surr.
Headph L
Headph R
BS003
BA001
AMDP
10
1

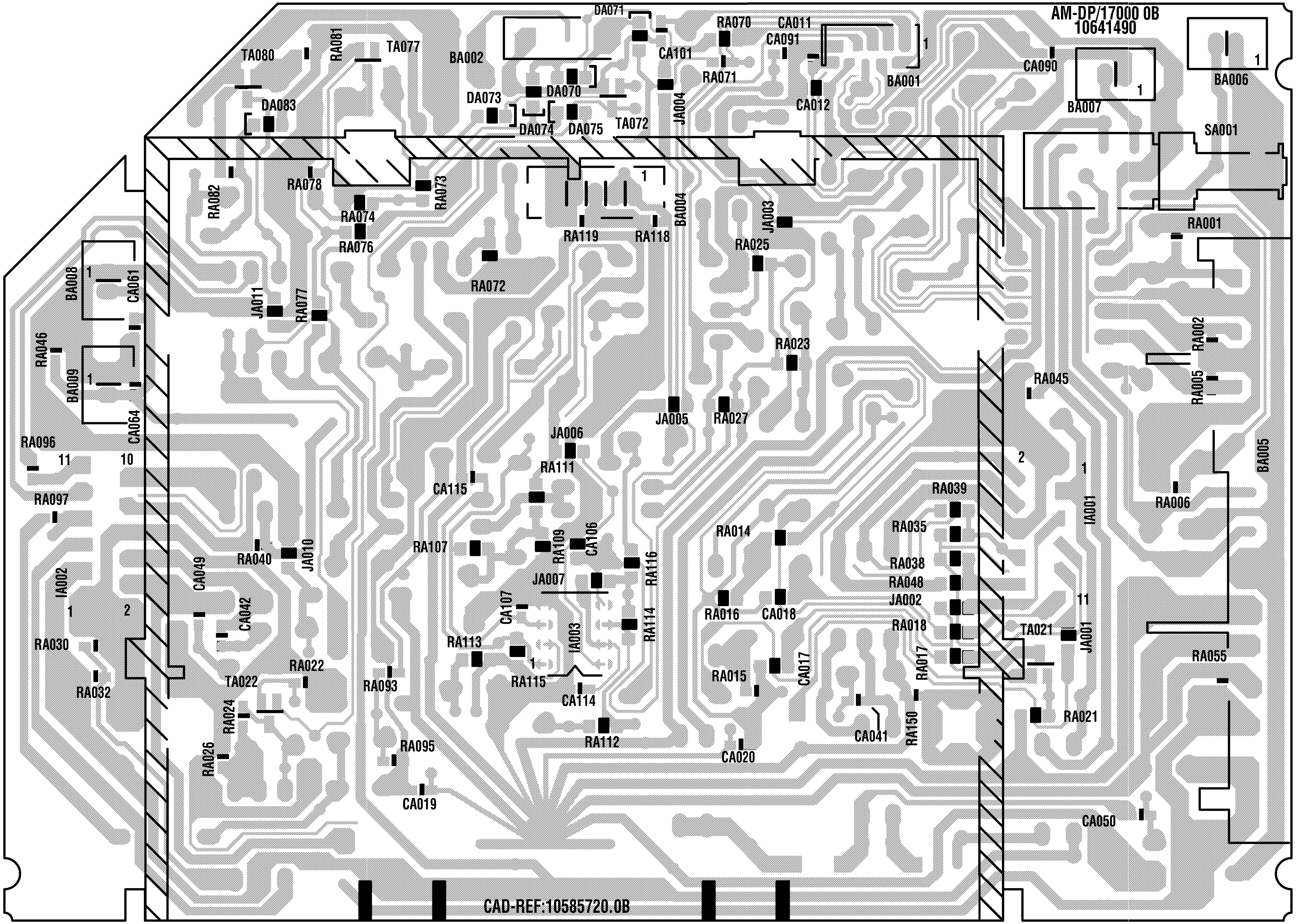
AUDIO SIGNAL MODULE DOLBY PROLOGIC - MODULE AUDIO DOLBY PROLOGIC - DOLBY PROLOGIC VERSTÄRKER - MODULO AUDIO DOLBY PROLOGIC - ESQUEMA DEL MÕDULO AMPLIFICADOR DE AUDIO

COMPONENT SIDE - CÖTE COMPOSANTS - BESTÜCKUNGSSEITE -LATO COMPONENTI - LADO COMPONENTES

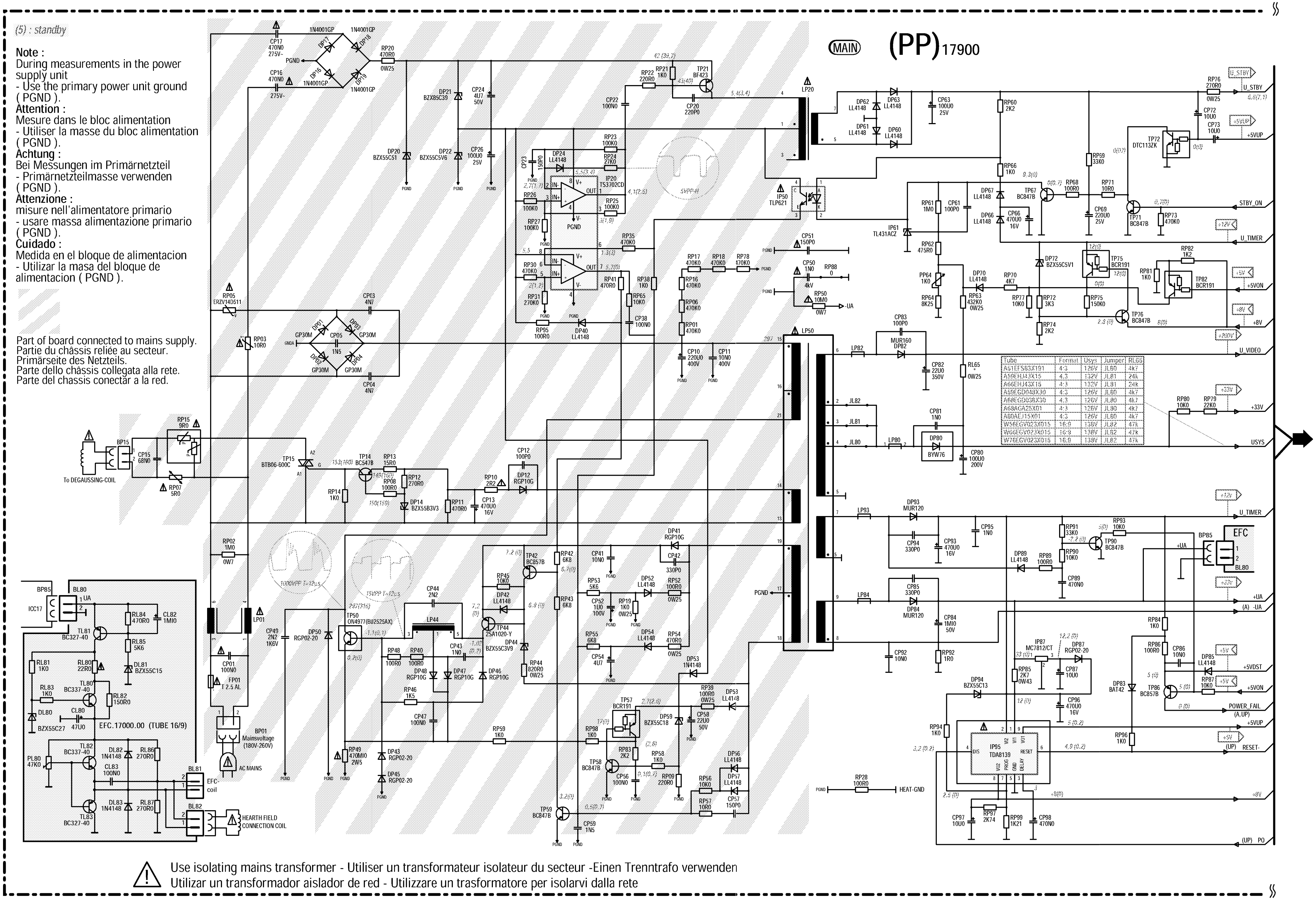

1
BA006
1
BA007
CA008
CA003
1
BA001
JA063
JA064
SA001
CA004
JA065
CA103
BA002
1
LA001
JA074
RA080
CA074
CA080
BA005
JA051
CA007
CA013
JA062
JA066
1
BA004
JA087
JA076
DA085
CA120
RA120
CA119
RA083
RA008
RA003
RA004
RA007
CA001
CA002
JA067
JA068
JA069
RA105
CA023
CA104
RA029
CA092
JA073
JA075
RA117
CA094
RA079
JA083
JA084
BA008
1
RA092
CA014
CA102
CA105
RA036
BA009
1
JA088
CA005
CA009
CA034
CA006
1
JA054
JA055
JA061
JA086
CA118
CA093
JA072
RA094
CA044
RA031
DA023
RA037
11
JA077
JA078
CA078
CA056
JA057
CA016
RA106
CA096
JA079
JA082
RA047
CA045
11
IA001
JA056
JA058
CA015
RA013
CA109
CA035
IA002
1
RA042
RA041
JA070
IA003
1
JA080
RA049
CA033
CA058
CA036
CA112
CA113
CA095
CA024
CA060
JA052
JA053
JA059
JA060
JA071
RA056
CA097
JA081
RA050
JA085
CA043
CA054
CA031
CA032
CA053
DA024
RA028
JA050

AUDIO SIGNAL MODULE DOLBY PROLOGIC - MODULE AUDIO DOLBY PROLOGIC - DOLBY PROLOGIC VERSTÄRKER - MODULO AUDIO DOLBY PROLOGIC - ESQUEMA DEL MÕDULO AMPLIFICADOR DE AUDIO

SOLDER SIDE - CÔTE SOUDURES - LÖTSEITE - LATO SALDATURE - LADO SOLDADURAS


AM-DP/17000 0B
10641490
DA071
RA070
CA011
CA091
TA080
RA081
TA077
BA002
CA101
RA071
BA001
CA090
BA006
BA007
DA083
DA073
DA070
DA074
DA075
TA072
JA004
CA012
SA001
RA078
RA082
RA074
RA073
RA076
RA119
RA118
BA004
JA003
RA025
RA001
BA008
CA061
JA011
RA077
RA072
RA046
BA009
CA064
RA023
RA002
RA005
RA045
RA096
11
10
JA005
RA027
JA006
RA111
CA115
2
1
RA039
RA097
RA035
IA001
RA006
BA005
RA040
JA010
RA107
RA109
CA106
RA014
RA038
RA116
JA007
RA048
JA002
IA002
CA049
CA042
RA016
CA018
RA018
RA114
CA107
IA003
TA021
JA001
RA030
RA113
RA017
RA055
RA022
RA015
CA017
RA115
TA022
RA093
RA032
CA114
RA150
RA021
RA024
RA112
CA041
CA020
RA026
RA095
CA019
CA050
CAD-REF:10585720.0B

POWER SUPPLY - ALIMENTATION - NETZTEIL - ALIMENTAZIONE - ALIMENTACIÓN


(5) : standby
MAIN
(PP)17900
RP05 ERZV14D511
RP03 10R0
CP03 4N7
DP01 DP02 DP03 DP04 GP30M
CP05 1N5
CP04 4N7
CP17 470N0 275V~
CP16 470N0 275V~
DP17 DP16 1N4001GP
DP18 DP19 1N4001GP
RP20 470R0 0W25
DP21 BZX85C39
CP24 4U7 50V
DP20 BZX55C51
DP22 BZX55C5V6
CP26 100U0 25V
RP22 220R0
RP21 1K0
TP21 BF423
CP22 100N0
CP20 220P0
RP23 100K0
RP24 27K0
DP24 LL4148
IP20 TS3702CD
RP25 100K0
RP26 100K0
RP27 100K0
CP23 150P0
RP35 470K0
RP30 470K0
RP31 270K0
RP95 100R0
DP40 LL4148
RP41 470R0
RP38 1K0
RP65 10K0
CP38 100N0
LP20
DP62 LL4148
DP63 LL4148
DP61 LL4148
DP60 LL4148
CP63 100U0 25V
IP50 TLP621
CP51 150P0
CP50 1N0 4kV
RP88 0
RP50 10M0 0W7
-UA
RP17 470K0
RP18 470K0
RP78 470K0
RP16 470K0
RP06 470K0
RP01 470K0
CP10 220U0 400V
CP11 10N0 400V
RP60 2K2
RP66 1K0
RP61 1M0
CP61 100P0
IP61 TL431ACZ
RP62 475R0
PP64 1K0
RP64 8K25
DP67 LL4148
DP66 LL4148
TP67 BC847B
CP66 470U0 16V
RP68 100R0
RP71 10R0
CP69 220U0 25V
TP71 BC847B
RP73 470K0
RP69 33K0
TP72 DTC113ZK
RP76 270R0 0W25
CP72 10U0
CP73 10U0
U_STBY
+5VUP
STBY_ON
+12V
U_TIMER
DP72 BZX55C5V1
TP75 BCR191
RP82 1K2
RP81 1K0
TP82 BCR191
+5V
+5VON
DP70 LL4148
RP70 4K7
RP63 432K0 0W25
RP77 10K0
RP72 3K3
RP75 150K0
TP76 BC847B
RP74 2K2
+8V
+200V
U_VIDEO
LP50
CP83 100P0
MUR160 DP82
LP82
CP82 22U0 350V
RL65 0W25
JL82 JL81 JL80
CP81 1N0
LP80
DP80 BYW76
CP80 100U0 200V
RP80 10K0
RP79 22K0
+33V
USYS
LP93
DP93 MUR120
CP94 330P0
CP93 470U0 16V
CP95 1N0
RP91 33K0
RP93 10K0
TP90 BC847B
DP89 LL4148
RP89 100R0
RP90 10K0
CP89 470N0
BP85
EFC
BL80
+UA
(A) -UA
LP84
CP85 330P0
DP84 MUR120
CP84 1M0 50V
CP92 10N0
RP92 1R0
IP87 MC7812/CT
DP87 RGP02-20
RP85 2K7 0W43
CP87 10U0
CP96 470U0 16V
RP84 1K0
RP86 100R0
CP86 10N0
DP85 LL4148
+5VDST
DP83 BAT42
TP86 BC857B
RP87 10K0
POWER_FAIL (A.UP)
+5VUP
DP94 BZX55C13
RP94 1K0
IP95 TDA8139
RP96 1K0
(UP) RESET-
RP28 100R0
HEAT-GND
CP97 10U0
RP97 2K74
RP99 1K21
CP98 470N0
(UP) PO
BP15
CP15 68N0
RP15 9R0
RP07 5R0
To DEGAUSSING-COIL
TP15 BTB06-600C
TP14 BC547B
RP13 15R0
RP12 270R0
RP08 100R0
DP14 BZX55B3V3
RP14 1K0
RP11 470R0
RP10 2R2
DP12 RGP10G
CP12 100P0
CP13 470U0 16V
RP02 1M0 0W7
LP01
CP01 100N0
FP01 T 2.5 AL
BP01 Mainsvoltage (180V-260V)
AC MAINS
CP49 2N2 1K6V
DP50 RGP02-20
TP50 ON4977(BU2525AX)
CP44 2N2
LP44
TP44 2SA1020-Y
DP44 BZX55C3V9
RP44 820R0 0W25
DP42 LL4148
RP45 10K0
TP42 BC857B
RP42 6K8
RP43 6K8
RP48 100R0
RP40 100R0
CP43 1N0
DP14 RGP10G
DP47 RGP10G
DP46 RGP10G
RP46 1K5
CP47 100N0
RP49 470M0 2W5
DP43 RGP02-20
DP45 RGP02-20
RP59 1K0
CP41 10N0
DP41 RGP10G
CP42 330P0
RP53 5K6
CP52 1U0 100V
RP19 1K0 0W25
DP52 LL4148
RP52 100R0 0W25
RP55 6K8
CP54 4U7
DP54 LL4148
RP54 470R0 0W25
DP53 1N4148
TP57 BCR191
RP98 1K0
DP59 BZX55C18
CP58 22U0 50V
RP39 100R0 0W25
DP53 LL4148
TP58 BC847B
RP83 2K2
RP58 1K0
CP56 100N0
RP09 220R0
DP56 LL4148
RP56 10K0
DP57 LL4148
RP57 10R0
CP57 150P0
TP59 BC847B
CP59 1N5
PGND
1000VPP T=12µs
150VPP T=12µs
5VPP-H
BP85
BL80
ICC17
TL81 BC327-40
RL84 470R0
CL82 1MI0
RL85 5K6
RL81 1K0
RL80 22R0
DL81 BZX55C15
RL83 1K0
TL80 BC337-40
RL82 150R0
DL80 BZX55C27
CL80 47U0
EFC.17000.00 (TUBE 16/9)
PL80 47K0
TL82 BC337-40
DL82 1N4148
RL86 270R0
CL83 100N0
BL81
EFC-coil
TL83 BC327-40
DL83 1N4148
RL87 270R0
BL82
HEARTH FIELD CONNECTION COIL

Note :
During measurements in the power supply unit
- Use the primary power unit ground (PGND).

Attention :
Mesure dans le bloc alimentation
- Utiliser la masse du bloc alimentation (PGND).

Achtung :
Bei Messungen im Primärnetzteil
- Primärnetzteilmasse verwenden (PGND).

Attenzione :
misure nell'alimentatore primario
- usare massa alimentazione primario (PGND).

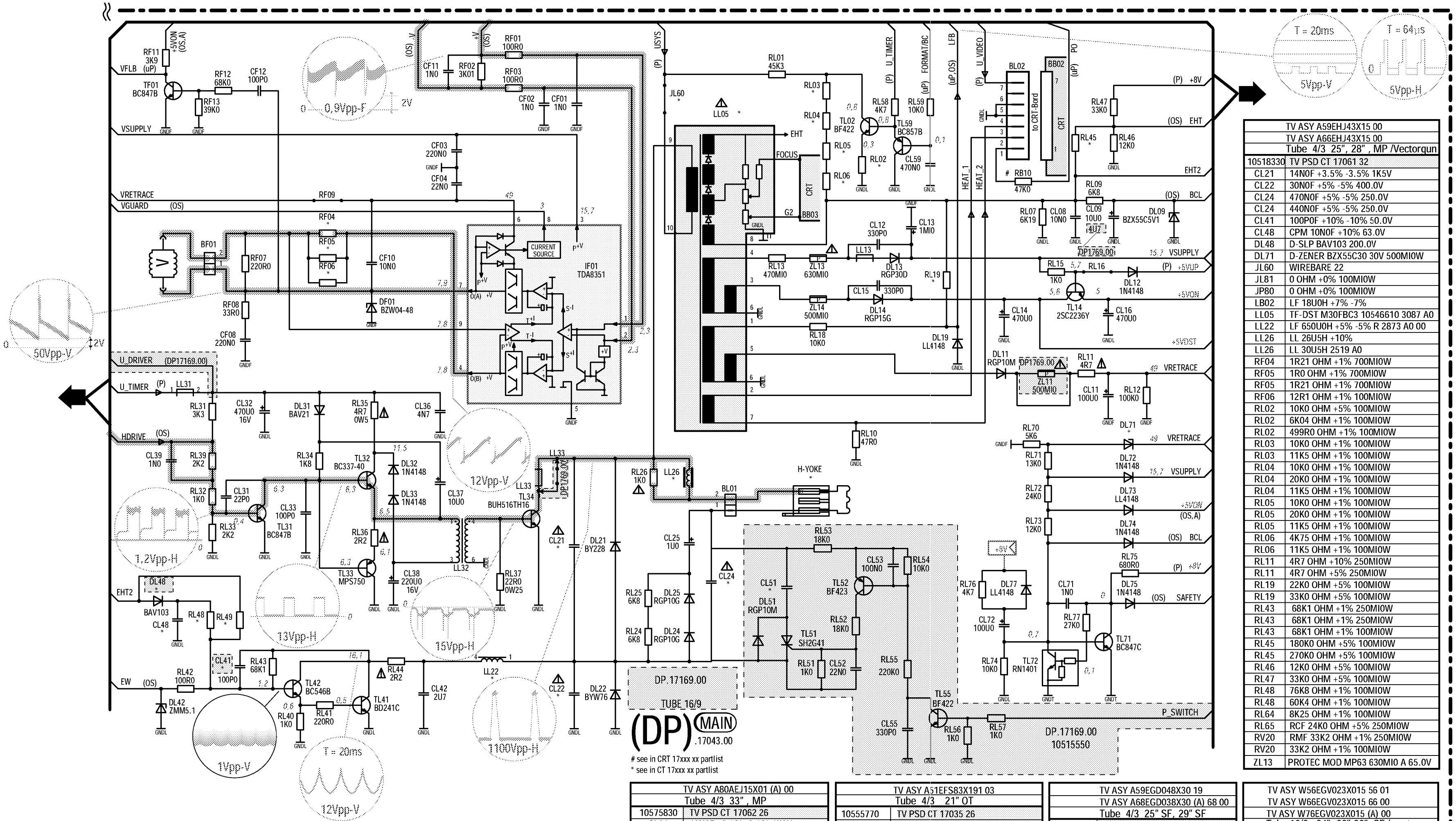
Cuidado :
Medida en el bloque de alimentacion
- Utilizar la masa del bloque de alimentacion (PGND).

Part of board connected to mains supply.
Partie du châssis reliée au secteur.
Primärseite des Netzteils.
Parte dello châssis collegata alla rete.
Parte del chassis conectar a la red.

Tube	Format	Usys	Jumper	RL65
A51EFS83X191	4:3	126V	JL80	4k7
A59EHJ43X15	4.3	132V	JL81	24k
A66EHJ43X15	4:3	132V	JL81	24k
A59EGD048X30	4:3	126V	JL80	4k7
A68EGD038X30	4:3	126V	JL80	4k7
A68AGA25X01	4:3	126V	JL80	4k7
A80AEJ15X01	4:3	126V	JL80	4k7
W56EGV023X015	16:9	138V	JL82	47k
W66EGV023X015	16:9	138V	JL82	47k
W76EGV023X015	16:9	138V	JL82	47k

⚠ Use isolating mains transformer - Utiliser un transformateur isolateur du secteur -Einen Trenntrafo verwenden
Utilizar un transformador aislador de red - Utilizzare un trasformatore per isolarvi dalla rete

SCANNING - BALAYAGE - ABLENKUNG - BARRIDO - SCANSIONE


VFLB (uP)
VSUPPLY
VRETRACE
VGUARD (OS)
U_DRIVER (DP17169.00)
U_TIMER (P)
HDRIVE (OS)
EHT2
EW (OS)
USYS
U_TIMER
FORMAT/BC
LFB
U_VIDEO
PO
(P) +8V
(OS) EHT
EHT2
(OS) BCL
VSUPPLY
(P) +5VUP
+5VON
+5VDST
VRETRACE
VSUPPLY
(OS,A)
(OS) BCL
(P) +8V
(OS) SAFETY
P_SWITCH
TF01 BC847B
IF01 TDA8351
CURRENT SOURCE
BF01
DF01 BZW04-48
TL31 BC847B
TL32 BC337-40
TL33 MPS750
TL34 BUH516TH16
TL41 BD241C
TL42 BC546B
TL02 BF422
TL59 BC857B
TL14 2SC2236Y
TL51 SH2G41
TL52 BF423
TL55 BF422
TL71 BC847C
TL72 RN1401
BL01
BL02
BB02
BB03
LL05
LL22
LL26
LL32
LL33
H-YOKE
EHT
FOCUS
CRT
G2
to CRT-Bord
HEAT_1
HEAT_2
DP.17169.00
TUBE 16/9
DP.17169.00
10515550
0,9Vpp-F
50Vpp-V
12Vpp-V
1,2Vpp-H
13Vpp-H
15Vpp-H
1100Vpp-H
1Vpp-V
T = 20ms
12Vpp-V
T = 20ms
5Vpp-V
T = 64µs
5Vpp-H
(DP) MAIN
.17043.00

# see in CRT 17xxx xx partlist
* see in CT 17xxx xx partlist

TV ASY A59EHJ43X15 00 TV ASY A66EHJ43X15 00 Tube 4/3 25", 28" , MP /Vectorgun	
10518330	TV PSD CT 17061 32
CL21	14N0F +3.5% -3.5% 1K5V
CL22	30N0F +5% -5% 400.0V
CL24	470N0F +5% -5% 250.0V
CL24	440N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	CPM 10N0F +10% 63.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL81	0 OHM +0% 100MI0W
JP80	0 OHM +0% 100MI0W
LB02	LF 18U0H +7% -7%
LL05	TF-DST M30FBC3 10546610 3087 A0
LL22	LF 650U0H +5% -5% R 2873 A0 00
LL26	LL 26U5H +10%
LL26	LL 30U5H 2519 A0
RF04	1R21 OHM +1% 700MI0W
RF05	1R0 OHM +1% 700MI0W
RF05	1R21 OHM +1% 700MI0W
RF06	12R1 OHM +1% 100MI0W
RL02	10K0 OHM +5% 100MI0W
RL02	6K04 OHM +1% 100MI0W
RL02	499R0 OHM +1% 100MI0W
RL03	10K0 OHM +1% 100MI0W
RL03	11K5 OHM +1% 100MI0W
RL04	10K0 OHM +1% 100MI0W
RL04	20K0 OHM +1% 100MI0W
RL04	11K5 OHM +1% 100MI0W
RL05	10K0 OHM +1% 100MI0W
RL05	20K0 OHM +1% 100MI0W
RL05	11K5 OHM +1% 100MI0W
RL06	4K75 OHM +1% 100MI0W
RL06	11K5 OHM +1% 100MI0W
RL11	4R7 OHM +10% 250MI0W
RL11	4R7 OHM +5% 250MI0W
RL19	22K0 OHM +5% 100MI0W
RL19	33K0 OHM +5% 100MI0W
RL43	68K1 OHM +1% 250MI0W
RL43	68K1 OHM +1% 250MI0W
RL43	68K1 OHM +1% 100MI0W
RL45	180K0 OHM +5% 100MI0W
RL45	270K0 OHM +5% 100MI0W
RL46	12K0 OHM +5% 100MI0W
RL47	33K0 OHM +5% 100MI0W
RL48	76K8 OHM +1% 100MI0W
RL48	60K4 OHM +1% 100MI0W
RL64	8K25 OHM +1% 100MI0W
RL65	RCF 24K0 OHM +5% 250MI0W
RV20	RMF 33K2 OHM +1% 250MI0W
RV20	33K2 OHM +1% 100MI0W
ZL13	PROTEC MOD MP63 630MI0 A 65.0V

⚠ Indicates critical safety components, and identical components should be used for replacement. Only then can the operational safety be garanteed.

Le remplacement des éléments de sécurité (repérés avec le symbole ⚠) par des composants non homologués selon la Norme CEI 65 entraine la non-conformité de l'appareil.
Dans ce cas, la responsabilité du fabricant n'est plus engagée.

Wenn Sicherheitsteile (mit dem Symbol ⚠ gekennzeichnet) durch nicht normgerechte Teile ersetzt werden, erlischt die Haftung des Herstellers.

La sostituzione degli elementi di sicurezza (contrassegnati con il segno ⚠) con componenti non omologati secondo la norma CEI 65 comporta la non conformitá dell'apparecchio.
In tal caso é "esclusa la responsabilitá" del costruttore.

La subtitución de elementos de seguridad (marcados con el simbolo ⚠) por componentes no homologados segun la norma CEI 65, provoca la no conformidad del aparato.
En ese caso, el fabricante cesa de ser responsable.

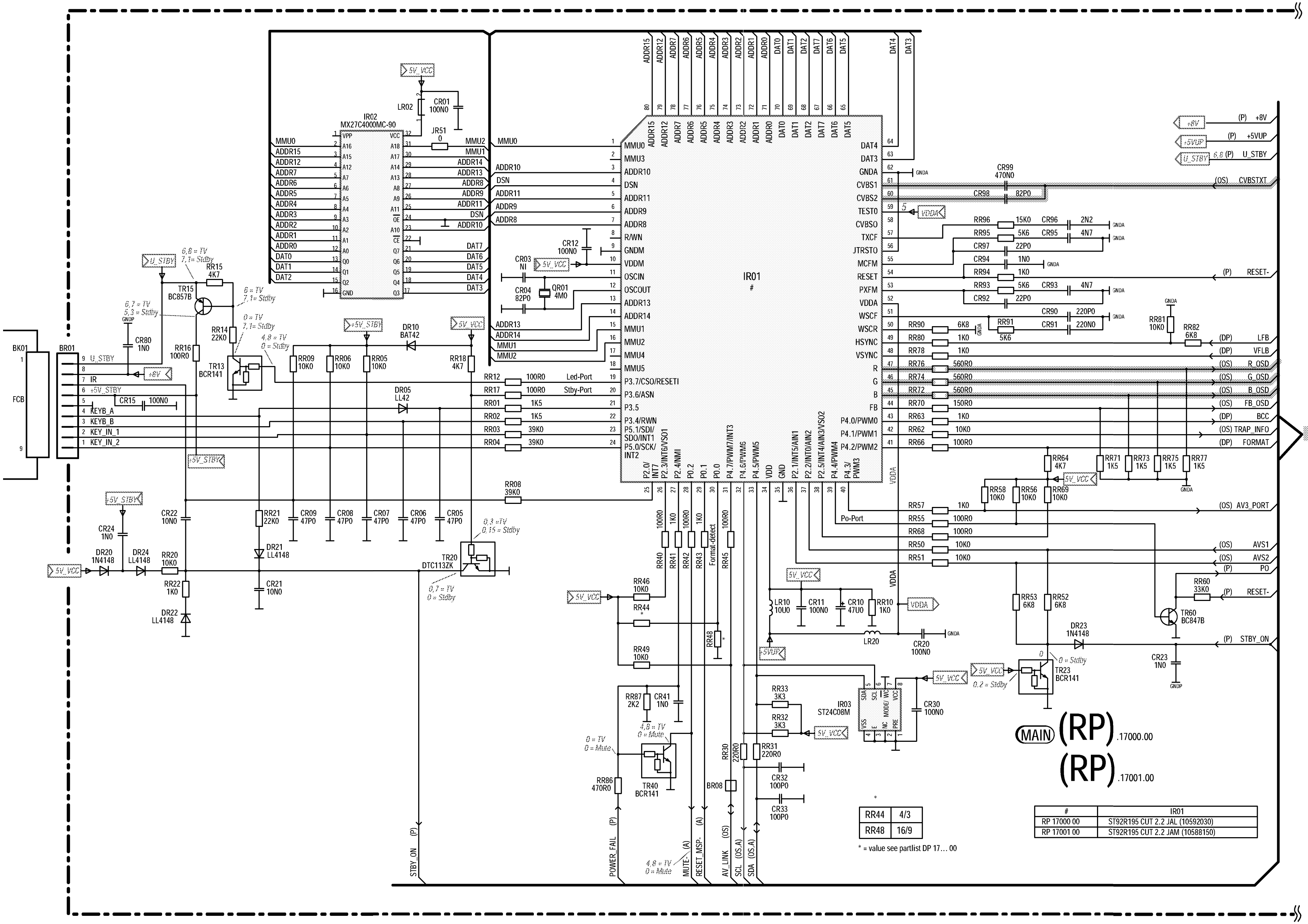
TV ASY A80AEJ15X01 (A) 00 Tube 4/3 33" , MP	
10575830	TV PSD CT 17062 26
CL21	16N2F +3.5% -3.5% 1K6V
CL22	30N0F +5% -5% 400.0V
CL24	560N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	10N0F +10% 63.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0% 100MI0W
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29 TBD 11
LL22	LF 650U0H +5% -5% R 2873 A0 00
LL26	LL 26U5H +10%
RF05	1R21 OHM +1% 700MI0W
RF06	10R0 OHM +1% 100MI0W
RL02	6K04 OHM +1% 100MI0W
RL03	4K75 OHM +1% 100MI0W
RL04	4K75 OHM +1% 100MI0W
RL05	4K75 OHM +1% 100MI0W
RL06	6K81 OHM +1% 100MI0W
RL19	13K0 OHM +5% 100MI0W
RL45	150K0 OHM +5% 100MI0W
RL48	76K8 OHM +1% 100MI0W
RL49	560K0 OHM +5% 100MI0W
RL65	RCF 4K7 OHM +5% 250MI0W
RV20	RMF 23K7 OHM +1% 250MI0W

TV ASY A51EFS83X191 03 Tube 4/3 21" OT	
10555770	TV PSD CT 17035 26
CL21	8N3F +3.5% -3.5% 1K6V
CL22	33N0F +5% -5% 1K0V
CL24	440N0F +5% -5% 250.0V
CL41	1N0F +10% -10% 50.0V
DL71	D-ZENER BZX55C24 24V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0% 100MI0W
LB02	LF 18U0H +7% -7%
LL05	TF-DST M30FBC3 10555640 3087 A0
LL22	LF 650U0H +5% -5% R 2873 A0 00
LL26	LL 85U0H 2519 A0
RF05	1R5 OHM +1% 700MI0W
RF06	10R0 OHM +1% 100MI0W
RL02	6K04 OHM +1% 100MI0W
RL03	10K0 OHM +1% 100MI0W
RL04	10K0 OHM +1% 100MI0W
RL05	10K0 OHM +1% 100MI0W
RL06	3K32 OHM +1% 100MI0W
RL45	110K0 OHM +5% 100MI0W
RL49	60K4 OHM +1% 100MI0W
RL65	4K7 OHM +5% 250MI0W
RV20	23K7 OHM +1% 250MI0W

TV ASY A59EGD048X30 19 TV ASY A68EGD038X30 (A) 68 00 Tube 4/3 25" SF, 29" SF	
10515520	TV PSD CT 17071 26
CL21	16N2F +3.5% -3.5% 1K6V
CL22	30N0F +5% -5% 400.0V
CL24	510N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	10N0F +10% 63.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0% 100MI0W
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29 TBD 13
LL22	LF 650U0H +5% -5%
LL26	LL 26U5H +10%
RF05	RMF 1R0 OHM +1% 700MI0W
RL02	6K8 OHM +5% 100MI0W
RL03	4K75 OHM +1% 100MI0W
RL04	4K75 OHM +1% 100MI0W
RL05	4K75 OHM +1% 100MI0W
RL06	4K75 OHM +1% 100MI0W
RL19	15K0 OHM +5% 100MI0W
RL45	180K0 OHM +5% 100MI0W
RL48	100K0 OHM +5% 100MI0W
RL49	300K0 OHM +5% 100MI0W
RL65	4K7 OHM +5% 250MI0W
RV20	33K2 OHM +1% 250MI0W

TV ASY W56EGV023X015 56 01 TV ASY W66EGV023X015 66 00 TV ASY W76EGV023X015 (A) 00 Tube 16/9 24", 28",32", SF / vectorgun	
10515530	TV PSD CT 17083 38
CL21	15N5F +3.5% -3.5% 1K6V
CL22	27N0F +5% -5% 400.0V
CL24	440N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	100N0F +5% 63.0V
CL51	290N0F +5% -5% 250.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55C24 24V 500MI0W
JL60	WIREBARE 22
JL82	0 OHM +0% 100MI0W
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29 15314460 10
LL22	LF 650U0H +5% -5%
LL26	LL 30U5H 2519 A0
RF05	1R21 OHM +1% 700MI0W
RL02	4K99 OHM +1% 100MI0W
RL03	6K49 OHM +1% 100MI0W
RL04	6K49 OHM +1% 100MI0W
RL05	6K49 OHM +1% 100MI0W
RL06	2K37 OHM +1% 100MI0W
RL19	13K0 OHM +5% 100MI0W
RL45	390K0 OHM +5% 100MI0W
RL48	220K0 OHM +5% 100MI0W
RL49	180K0 OHM +5% 100MI0W
RL65	47K0 OHM +5% 250MI0W
RV20	100K0 OHM +1% 250MI0W

CONTROL MICROPROCESSOR - MICROPROCESSEUR DE COMMANDE - MIKROPROZESSOR - MICROPROCESSORE DEI COMANDI - MICROPROCESADOR DE LOS MANDOS


IR01
IR02
MX27C4000MC-90
IR03
ST24C08M
MAIN (RP).17000.00
(RP).17001.00
BK01
BR01
FCB
9 U_STBY
8
7 IR
6 +5V_STBY
5
4 KEYB_A
3 KEYB_B
2 KEY_IN_1
1 KEY_IN_2
MMU0
MMU1
MMU2
MMU3
MMU4
MMU5
ADDR0
ADDR1
ADDR2
ADDR3
ADDR4
ADDR5
ADDR6
ADDR7
ADDR8
ADDR9
ADDR10
ADDR11
ADDR12
ADDR13
ADDR14
ADDR15
DAT0
DAT1
DAT2
DAT3
DAT4
DAT5
DAT6
DAT7
DSN
R/WN
GNDM
VDDM
OSCIN
OSCOUT
P3.7/CSO/RESETI
P3.6/ASN
P3.5
P3.4/RWN
P5.1/SDI/SDO/INT1
P5.0/SCK/INT2
P2.0/INT7
P2.3/INT6/VSO1
P2.4/NMI
P0.2
P0.1
P0.0
P4.7/PWM7/INT3
P4.6/PWM6
P4.5/PWM5
VDD
GND
P2.1/INT5/AIN1
P2.2/INT0/AIN2
P2.5/INT4/AIN3/VSO2
P4.4/PWM4
P4.3/PWM3
P4.2/PWM2
P4.1/PWM1
P4.0/PWM0
FB
B
G
R
VSYNC
HSYNC
WSCR
WSCF
VDDA
PXFM
RESET
MCFM
JTRSTO
TXCF
CVBSO
TEST0
CVBS2
CVBS1
GNDA
Led-Port
Stby-Port
Po-Port
Formal-detect
5V_VCC
+5V_STBY
U_STBY
+8V
+5VUP
VDDA
GNDA
GNDP
(P) +8V
(P) +5VUP
6,6 (P) U_STBY
(OS) CVBSTXT
(P) RESET-
(DP) LFB
(DP) VFLB
(OS) R_OSD
(OS) G_OSD
(OS) B_OSD
(OS) FB_OSD
(DP) BCC
(OS) TRAP_INFO
(DP) FORMAT
(OS) AV3_PORT
(OS) AVS1
(OS) AVS2
(P) PO
(P) RESET-
(P) STBY_ON
STBY_ON (P)
POWER_FAIL (P)
MUTE- (A)
RESET_MSP- (A)
AV_LINK (OS)
SCL (OS,A)
SDA (OS,A)
TR13 BCR141
TR15 BC857B
TR20 DTC113ZK
TR23 BCR141
TR40 BCR141
TR60 BC847B
QR01 4M0
DR05 LL42
DR10 BAT42
DR20 1N4148
DR21 LL4148
DR22 LL4148
DR23 1N4148
DR24 LL4148
LR02
LR10 10U0
LR20
BR08
JR51 0
CR01 100N0
CR03 NI
CR04 82P0
CR05 47P0
CR06 47P0
CR07 47P0
CR08 47P0
CR09 47P0
CR10 47U0
CR11 100N0
CR12 100N0
CR15 100N0
CR20 100N0
CR21 10N0
CR22 10N0
CR23 1N0
CR24 1N0
CR30 100N0
CR32 100P0
CR33 100P0
CR41 1N0
CR80 1N0
CR90 220P0
CR91 220N0
CR92 22P0
CR93 4N7
CR94 1N0
CR95 4N7
CR96 2N2
CR97 22P0
CR98 82P0
CR99 470N0
RR01 1K5
RR02 1K5
RR03 39K0
RR04 39K0
RR05 10K0
RR06 10K0
RR08 39K0
RR09 10K0
RR10 1K0
RR12 100R0
RR14 22K0
RR15 4K7
RR16 100R0
RR17 100R0
RR18 4K7
RR20 10K0
RR21 22K0
RR22 1K0
RR30 220R0
RR31 220R0
RR32 3K3
RR33 3K3
RR40 100R0
RR41 1K0
RR42 100R0
RR43 1K0
RR44 *
RR45 100R0
RR46 10K0
RR48 *
RR49 10K0
RR50 10K0
RR51 10K0
RR52 6K8
RR53 6K8
RR55 100R0
RR56 10K0
RR57 1K0
RR58 10K0
RR60 33K0
RR62 10K0
RR63 1K0
RR64 4K7
RR66 100R0
RR68 100R0
RR69 10K0
RR70 150R0
RR71 1K5
RR72 560R0
RR73 1K5
RR74 560R0
RR75 1K5
RR76 560R0
RR77 1K5
RR78 1K0
RR80 1K0
RR81 10K0
RR82 6K8
RR86 470R0
RR87 2K2
RR90 6K8
RR91 5K6
RR92 22P0
RR93 5K6
RR94 1K0
RR95 5K6
RR96 15K0
6,8 = TV
7,1= Stdby
6,7 = TV
5,3 = Stdby
6 = TV
7,1= Stdby
0 = TV
7,1= Stdby
4,8 = TV
0 = Stdby
0,3 = TV
0,15 = Stdby
0,7 = TV
0 = Stdby
0 = TV
0 = Mute
4,8 = TV
0 = Mute
0 = Stdby
0,2 = Stdby

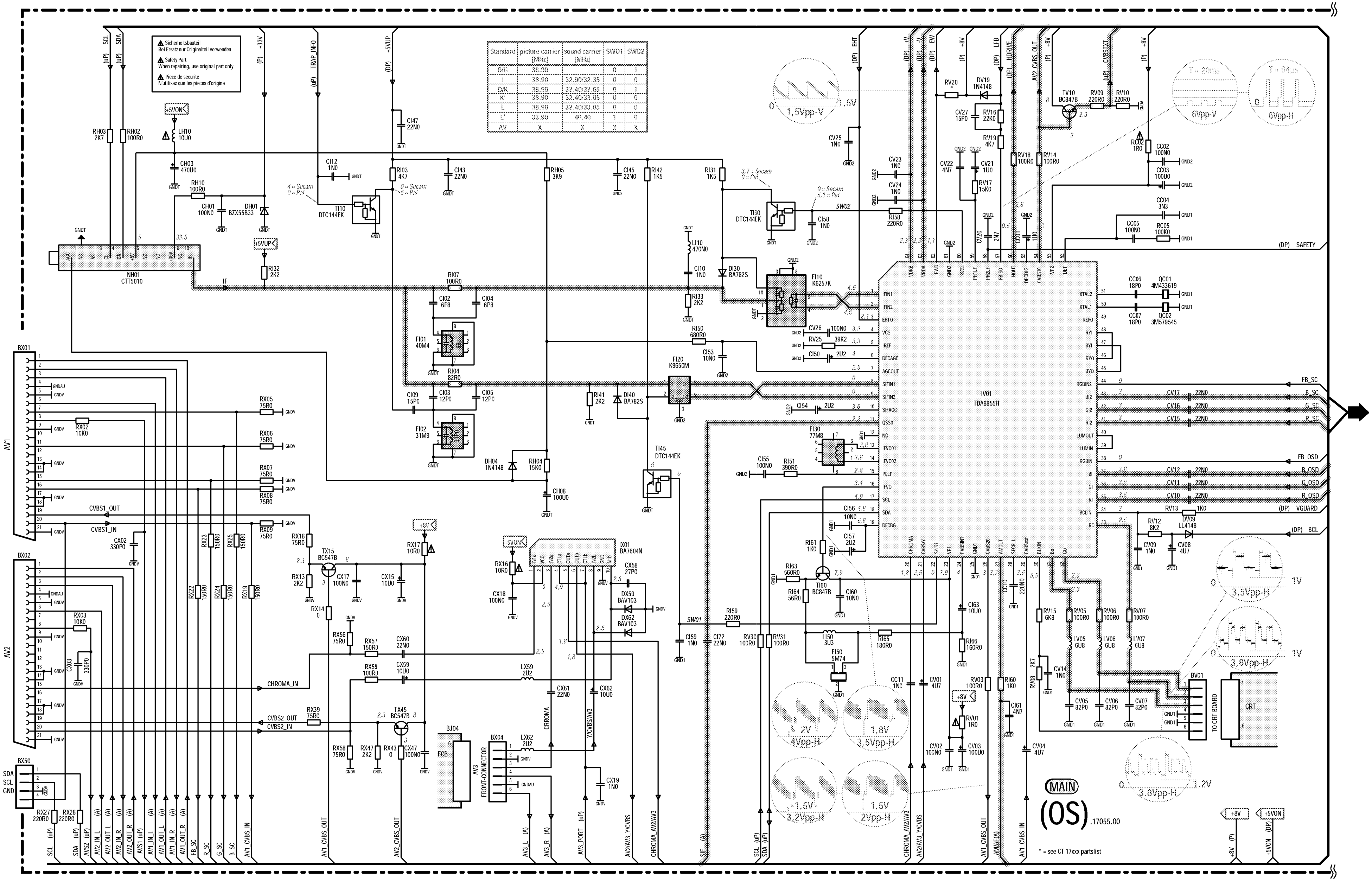
*

RR44	4/3
RR48	16/9

* = value see partlist DP 17… 00

#	IR01
RP 17000 00	ST92R195 CUT 2.2 JAL (10592030)
RP 17001 00	ST92R195 CUT 2.2 JAM (10588150)

RF/FI/ SCART INTERFACE/VIDEO SIGNAL PROCESSING -HF/FI INTERFACE PERITELEVISION/TRAITEMENT LUMINANCE CHROMINANCE - HF/ZF/ SCART INTERFACE/VIDEO SIGNALVERARBEITUNG - RF/FI /PRESA PERITEL/ELABORAZIONE VIDEO - RF/FI /EUROCONECTOR / TRATAMENTO VIDEO


NH01
CTT5010
IF
BX01
AV1
BX02
AV2
BX50
SDA
SCL
GND
CVBS1_OUT
CVBS1_IN
CHROMA_IN
CVBS2_OUT
CVBS2_IN
TX15
BC547B
TX45
BC547B
IX01
BA7604N
BJ04
FCB
BX04
AV3
FRONT-CONNECTOR
FI01
40M4
FI02
31M9
FI10
K6257K
FI20
K9650M
FI30
77M8
FI50
5M74
TI10
DTC144EK
TI30
DTC144EK
TI45
DTC144EK
TI60
BC847B
TV10
BC847B
IV01
TDA8855H
QC01
4M433619
QC02
3M579545
DV19
1N4148
DV09
LL4148
DI30
BA782S
DI40
BA782S
DH01
BZX55B33
DH04
1N4148
BV01
TO CRT BOARD
CRT
4 = Secam
0 = Pal
3,7 = Secam
0 = Pal
0 = Secam
5,1 = Pal
SW01
SW02
1,5Vpp-V
6Vpp-V
6Vpp-H
T = 20ms
T = 64µs
3,5Vpp-H
3,8Vpp-H
4Vpp-H
3,5Vpp-H
3,2Vpp-H
2Vpp-H
3,8Vpp-H
SAFETY
VGUARD
BCL
FB_SC
B_SC
G_SC
R_SC
FB_OSD
B_OSD
G_OSD
R_OSD
EHT
EW
HORIVE
LFB
AV2_CVBS_OUT
CVBSTXT
TRAP_INFO
+5VUP
+33V
+5VON
+8V
SCL
SDA
AVS2
AV2_IN_L
AV2_OUT_L
AV2_IN_R
AV2_OUT_R
AVS1
AV1_IN_L
AV1_OUT_L
AV1_IN_R
AV1_OUT_R
FB_SC
R_SC
G_SC
B_SC
AV1_CVBS_IN
AV1_CVBS_OUT
AV2_CVBS_OUT
AV3_L
AV3_R
AV3_PORT
AV2/AV3_Y/CVBS
CHROMA_AV2/AV3
SIF
CHROMA
Y/CVBS/AV3
AM/AF
AV1_CVBS_IN
MAIN
(OS)
.17055.00
* = see CT 17xxx partslist

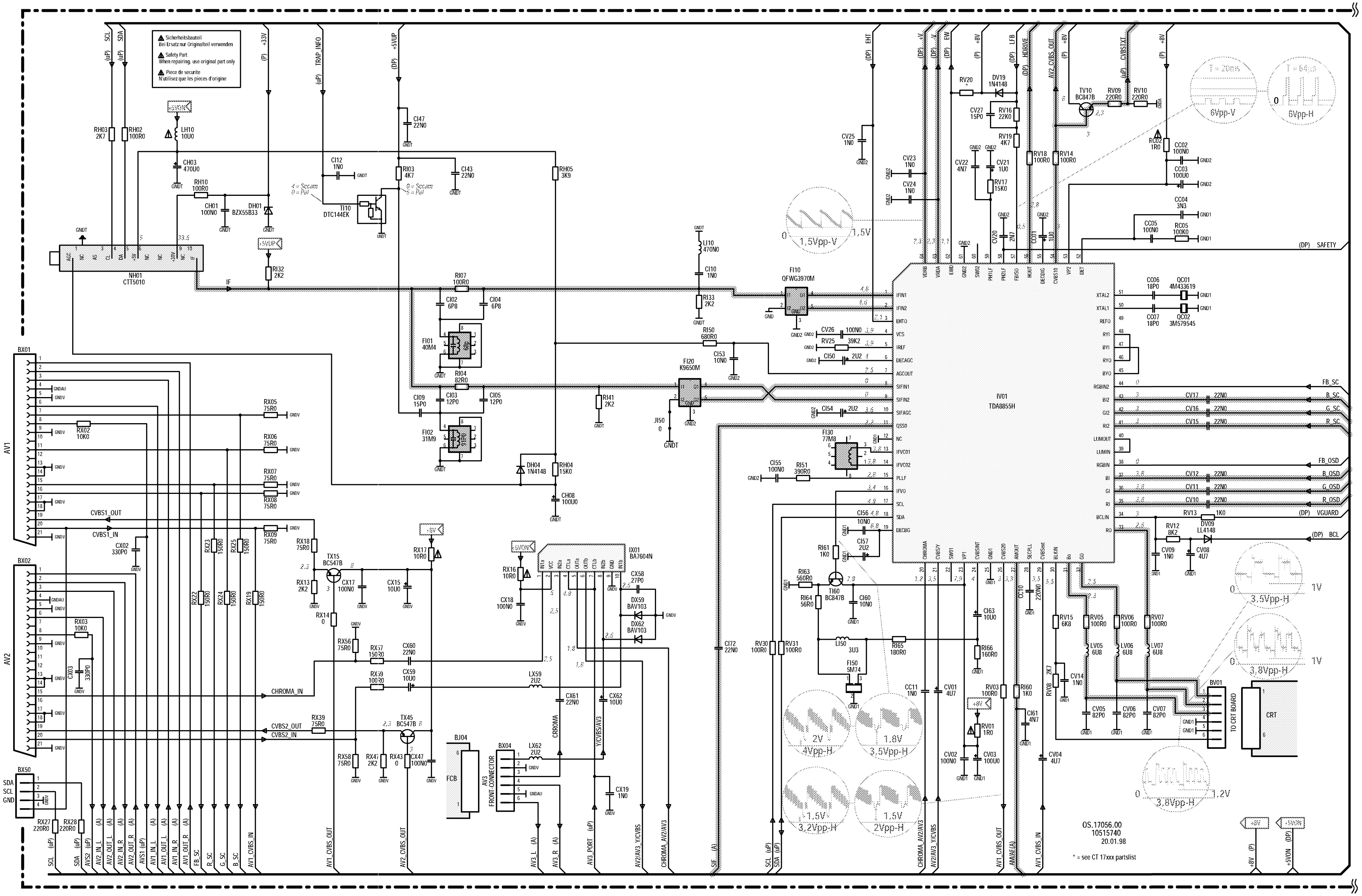
⚠ Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden

⚠ Safety Part
When repairing, use original part only

⚠ Piece de securite
N'utilisez que les pieces d'origine

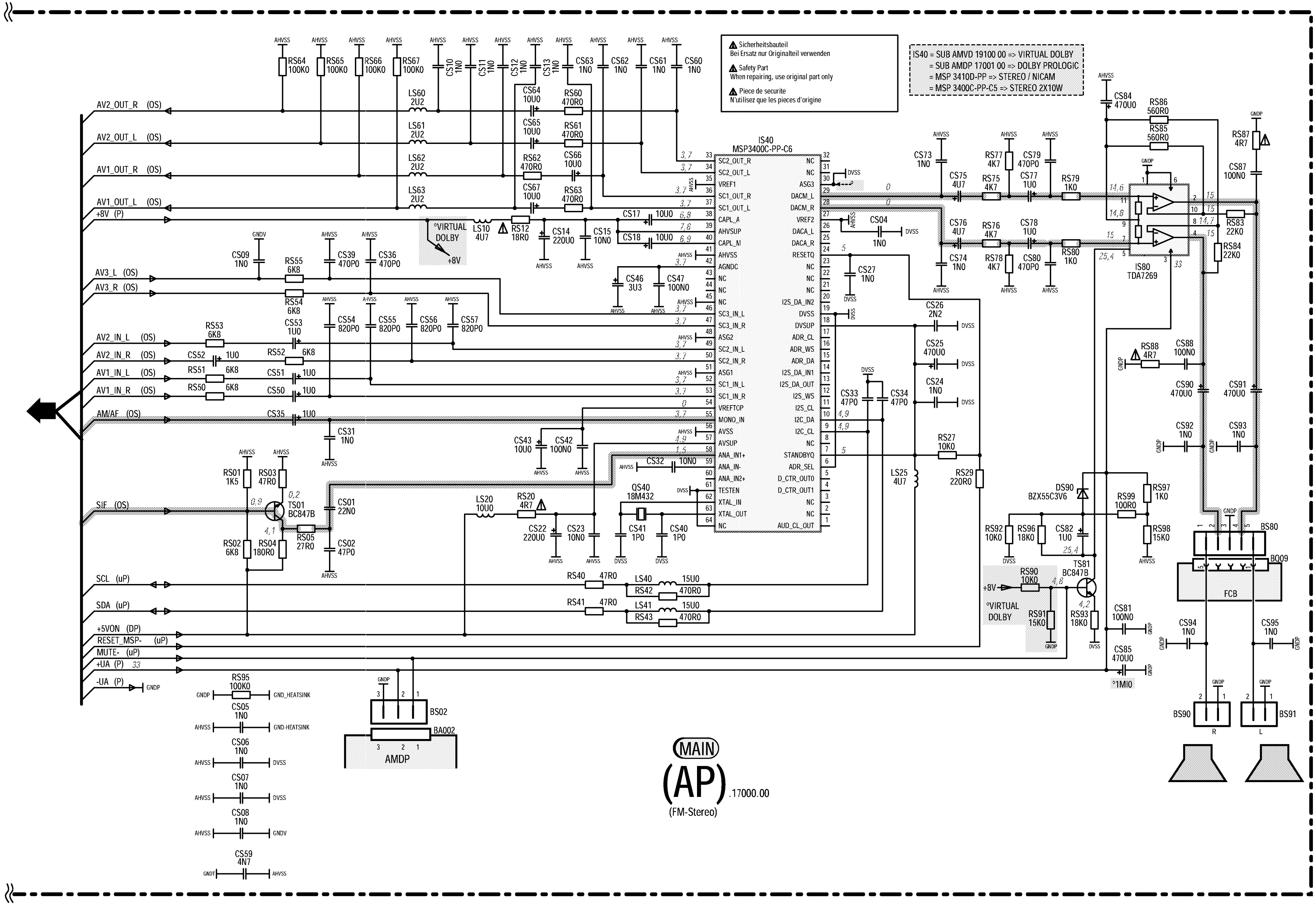
Standard	picture carrier [MHz]	sound carrier [MHz]	SWO1	SWO2
B/G	38.90		0	1
I	38.90	32.90/32.35	0	0
D/K	38.90	32.40/32.65	0	1
K'	38.90	32.40/33.05	0	0
L	38.90	32.40/33.05	0	0
L'	33.90	40.40	1	0
AV	X	X	X	X

RF/FI/ SCART INTERFACE/VIDEO SIGNAL PROCESSING -HF/FI INTERFACE PERITELEVISION/TRAITEMENT LUMINANCE CHROMINANCE - HF/ZF/ SCART INTERFACE/VIDEO SIGNALVERARBEITUNG - RF/FI /PRESA PERITEL/ELABORAZIONE VIDEO - RF/FI /EUROCONECTOR/TRATAMENTO VIDEO



Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden
Safety Part
When repairing, use original part only
Piece de securite
N'utilisez que les pieces d'origine
NH01
CTT5010
IF
BX01
AV1
BX02
AV2
BX50
SDA
SCL
GND
CVBS1_OUT
CVBS1_IN
CHROMA_IN
CVBS2_OUT
CVBS2_IN
FI10
QFWG3970M
FI20
K9650M
FI01
40M4
FI02
31M9
FI30
77M8
FI50
5M74
TI10
DTC144EK
IX01
BA7604N
IV01
TDA8855H
TX15
BC547B
TX45
BC547B
TI60
BC847B
TV10
BC847B
BJ04
FCB
BX04
AV3
FRONT CONNECTOR
BV01
TO CRT BOARD
CRT
FB_SC
B_SC
G_SC
R_SC
FB_OSD
B_OSD
G_OSD
R_OSD
(DP) VGUARD
(DP) BCL
(DP) SAFETY
1,5Vpp-V
1,5V
6Vpp-V
6Vpp-H
T = 20mS
T = 64µS
3,5Vpp-H
3,8Vpp-H
1V
1,2V
4Vpp-H
2V
3,5Vpp-H
1,8V
3,2Vpp-H
1,5V
2Vpp-H
SCL (uP)
SDA (uP)
AVS2 (uP)
AV2_IN_L (A)
AV2_OUT_L (A)
AV2_IN_R (A)
AV2_OUT_R (A)
AVS1 (uP)
AV1_IN_L (A)
AV1_OUT_L (A)
AV1_IN_R (A)
AV1_OUT_R (A)
FB_SC
R_SC
G_SC
B_SC
AV1_CVBS_IN
AV1_CVBS_OUT
AV2_CVBS_OUT
AV3_L (A)
AV3_R (A)
AV3_PORT (uP)
AV2/AV3_Y/CVBS
CHROMA_AV2/AV3
SIF (A)
SCL (uP)
SDA (uP)
CHROMA_AV2/AV3
AV2/AV3_Y/CVBS
AV1_CVBS_OUT
AM/AE(A)
AV1_CVBS_IN
+8V (P)
+5VON (DP)
(uP) SCL
(uP) SDA
(P) +33V
(uP) TRAP_INFO
(DP) +5VUP
(DP) EHT
(DP) -V
(DP) +V
(DP) EW
(P) +8V
(DP) LFB
(DP) HDRIVE
AV2_CVBS_OUT
(P) +8V
(uP) CVBSTXT
(P) +8V
OS.17056.00
10515740
20.01.98
* = see CT 17xxx partslist

AMPLIFIER SCHEMATIC DIAGRAM - SCHEMA DE L'AMPLIFICATEUR - SCHALTBILD AUDIO-SIGNALVERABEITUNG - SCHEMA DELL' AMPLIFICATORE ESQUEMA DEL AMPLIFICADOR (STEREO)



⚠ Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden

⚠ Safety Part
When repairing, use original part only

⚠ Piece de securite
N'utilisez que les pieces d'origine

IS40 = SUB AMVD 19100 00 => VIRTUAL DOLBY
= SUB AMDP 17001 00 => DOLBY PROLOGIC
= MSP 3410D-PP => STEREO / NICAM
= MSP 3400C-PP-C5 => STEREO 2X10W

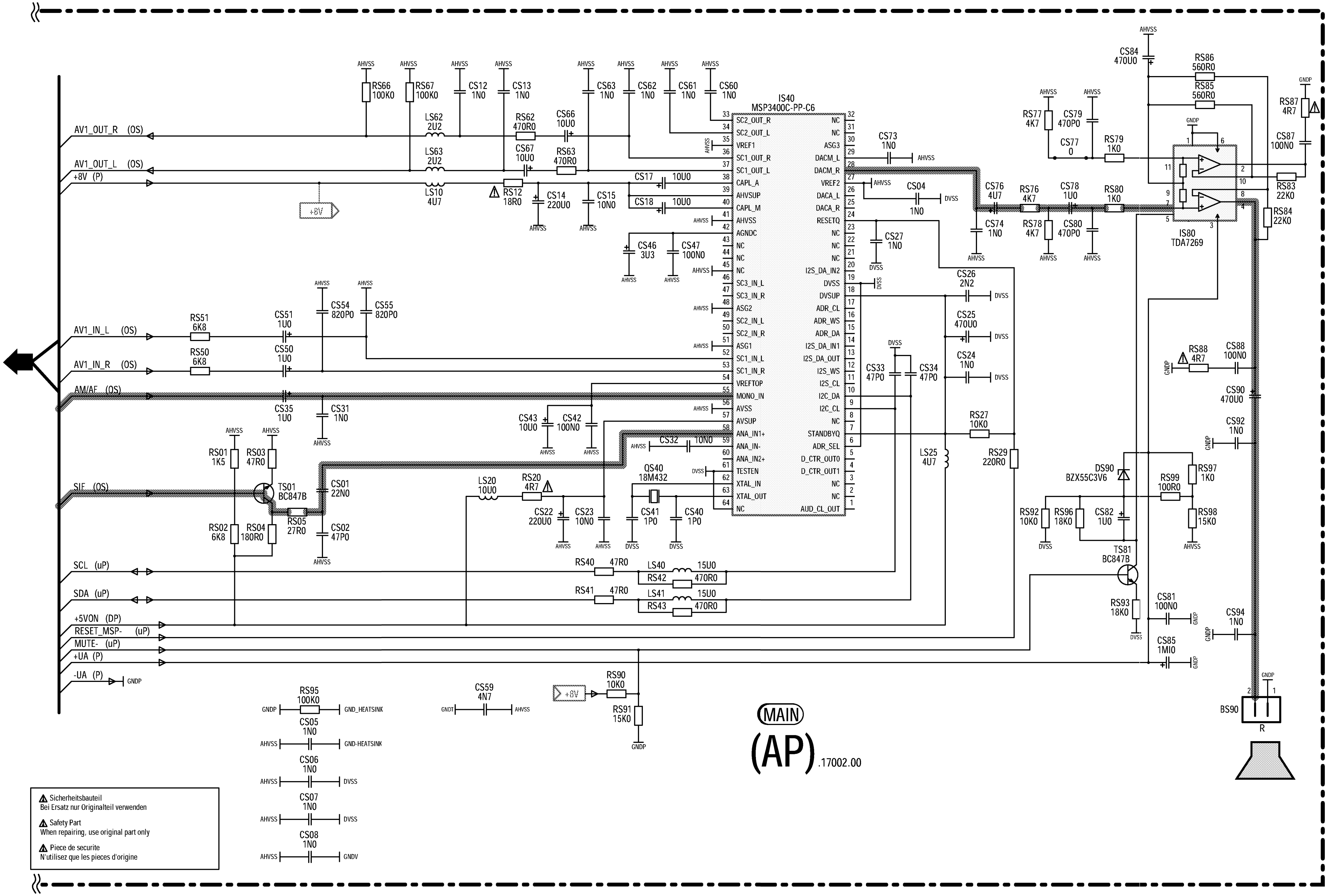
AV2_OUT_R (OS)
AV2_OUT_L (OS)
AV1_OUT_R (OS)
AV1_OUT_L (OS)
+8V (P)
AV3_L (OS)
AV3_R (OS)
AV2_IN_L (OS)
AV2_IN_R (OS)
AV1_IN_L (OS)
AV1_IN_R (OS)
AM/AF (OS)
SIF (OS)
SCL (uP)
SDA (uP)
+5VON (DP)
RESET_MSP- (uP)
MUTE- (uP)
+UA (P)
-UA (P)
IS40
MSP3400C-PP-C6
SC2_OUT_R
SC2_OUT_L
VREF1
SC1_OUT_R
SC1_OUT_L
CAPL_A
AHVSUP
CAPL_M
AHVSS
AGNDC
SC3_IN_L
SC3_IN_R
ASG2
SC2_IN_L
SC2_IN_R
ASG1
SC1_IN_L
SC1_IN_R
VREFTOP
MONO_IN
AVSS
AVSUP
ANA_IN1+
ANA_IN-
ANA_IN2+
TESTEN
XTAL_IN
XTAL_OUT
ASG3
DACM_L
DACM_R
VREF2
DACA_L
DACA_R
RESETQ
I2S_DA_IN2
DVSS
DVSUP
ADR_CL
ADR_WS
ADR_DA
I2S_DA_IN1
I2S_DA_OUT
I2S_WS
I2S_CL
I2C_DA
I2C_CL
STANDBYQ
ADR_SEL
D_CTR_OUT0
D_CTR_OUT1
AUD_CL_OUT
IS80
TDA7269
QS40
18M432
TS01
BC847B
TS81
BC847B
DS90
BZX55C3V6
°VIRTUAL DOLBY
BS80
BQ09
FCB
BS90
BS91
R
L
BS02
BA002
AMDP
RS95 100K0
GND_HEATSINK
GND-HEATSINK
AHVSS
DVSS
GNDP
GNDV
GNDT
°1MI0

(MAIN)

(AP).17000.00

(FM-Stereo)

AMPLIFIER SCHEMATIC DIAGRAM - SCHEMA DE L’AMPLIFICATEUR - SCHALTBILD AUDIO-SIGNALVERABEITUNG - SCHEMA DELL’ AMPLIFICATORE - ESQUEMA DEL AMPLIFICADOR
(MONO)

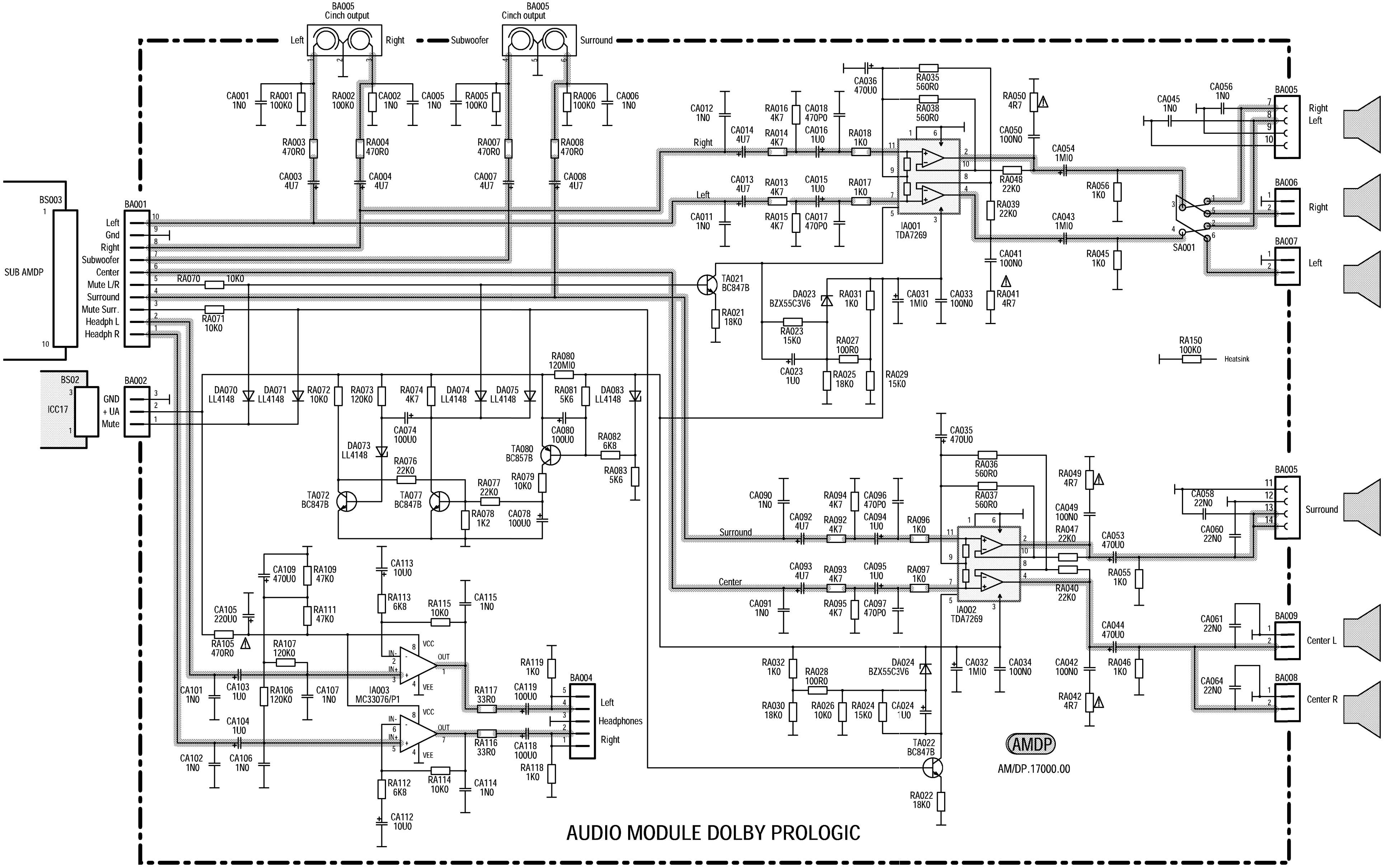

AV1_OUT_R (OS)
AV1_OUT_L (OS)
+8V (P)
AV1_IN_L (OS)
AV1_IN_R (OS)
AM/AF (OS)
SIF (OS)
SCL (uP)
SDA (uP)
+5VON (DP)
RESET_MSP- (uP)
MUTE- (uP)
+UA (P)
-UA (P)
GNDP
AHVSS
DVSS
RS66 100K0
RS67 100K0
CS12 1N0
CS13 1N0
LS62 2U2
LS63 2U2
LS10 4U7
RS62 470R0
CS67 10U0
CS66 10U0
RS63 470R0
RS12 18R0
CS14 220U0
CS15 10N0
CS63 1N0
CS62 1N0
CS61 1N0
CS60 1N0
CS17 10U0
CS18 10U0
CS46 3U3
CS47 100N0
IS40
MSP3400C-PP-C6
SC2_OUT_R
SC2_OUT_L
VREF1
SC1_OUT_R
SC1_OUT_L
CAPL_A
AHVSUP
CAPL_M
AHVSS
AGNDC
NC
SC3_IN_L
SC3_IN_R
ASG2
SC2_IN_L
SC2_IN_R
ASG1
SC1_IN_L
SC1_IN_R
VREFTOP
MONO_IN
AVSS
AVSUP
ANA_IN1+
ANA_IN-
ANA_IN2+
TESTEN
XTAL_IN
XTAL_OUT
ASG3
DACM_L
DACM_R
VREF2
DACA_L
DACA_R
RESETQ
I2S_DA_IN2
DVSS
DVSUP
ADR_CL
ADR_WS
ADR_DA
I2S_DA_IN1
I2S_DA_OUT
I2S_WS
I2S_CL
I2C_DA
I2C_CL
STANDBYQ
ADR_SEL
D_CTR_OUT0
D_CTR_OUT1
AUD_CL_OUT
CS73 1N0
CS04 1N0
CS27 1N0
CS26 2N2
CS25 470U0
CS24 1N0
CS33 47P0
CS34 47P0
RS27 10K0
RS29 220R0
LS25 4U7
RS51 6K8
RS50 6K8
CS51 1U0
CS50 1U0
CS54 820P0
CS55 820P0
CS35 1U0
CS31 1N0
CS43 10U0
CS42 100N0
CS32 10N0
QS40 18M432
CS41 1P0
CS40 1P0
LS20 10U0
RS20 4R7
CS22 220U0
CS23 10N0
RS01 1K5
RS03 47R0
TS01 BC847B
RS05 27R0
CS01 22N0
CS02 47P0
RS02 6K8
RS04 180R0
RS40 47R0
RS41 47R0
LS40 15U0
LS41 15U0
RS42 470R0
RS43 470R0
RS90 10K0
RS91 15K0
CS59 4N7
RS95 100K0
CS05 1N0
CS06 1N0
CS07 1N0
CS08 1N0
GND_HEATSINK
GND-HEATSINK
GNDT
GNDV
CS84 470U0
RS86 560R0
RS85 560R0
RS87 4R7
CS87 100N0
RS77 4K7
CS79 470P0
CS77 0
RS79 1K0
CS76 4U7
RS76 4K7
CS78 1U0
RS80 1K0
CS74 1N0
RS78 4K7
CS80 470P0
IS80 TDA7269
RS83 22K0
RS84 22K0
RS88 4R7
CS88 100N0
CS90 470U0
CS92 1N0
DS90 BZX55C3V6
RS99 100R0
RS97 1K0
RS98 15K0
RS92 10K0
RS96 18K0
CS82 1U0
TS81 BC847B
RS93 18K0
CS81 100N0
CS85 1MI0
CS94 1N0
BS90
R
MAIN
(AP).17002.00

⚠ Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden

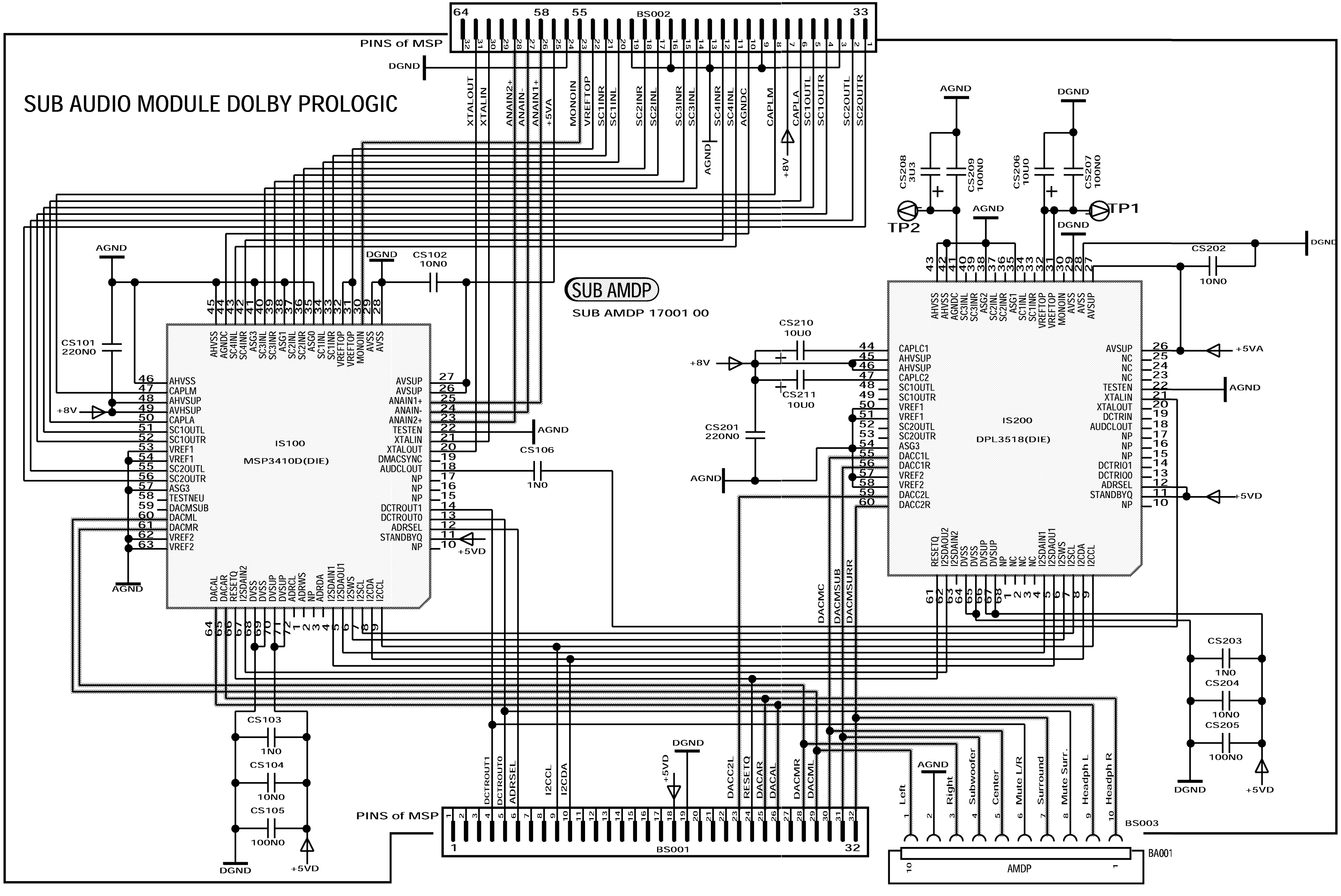
⚠ Safety Part
When repairing, use original part only

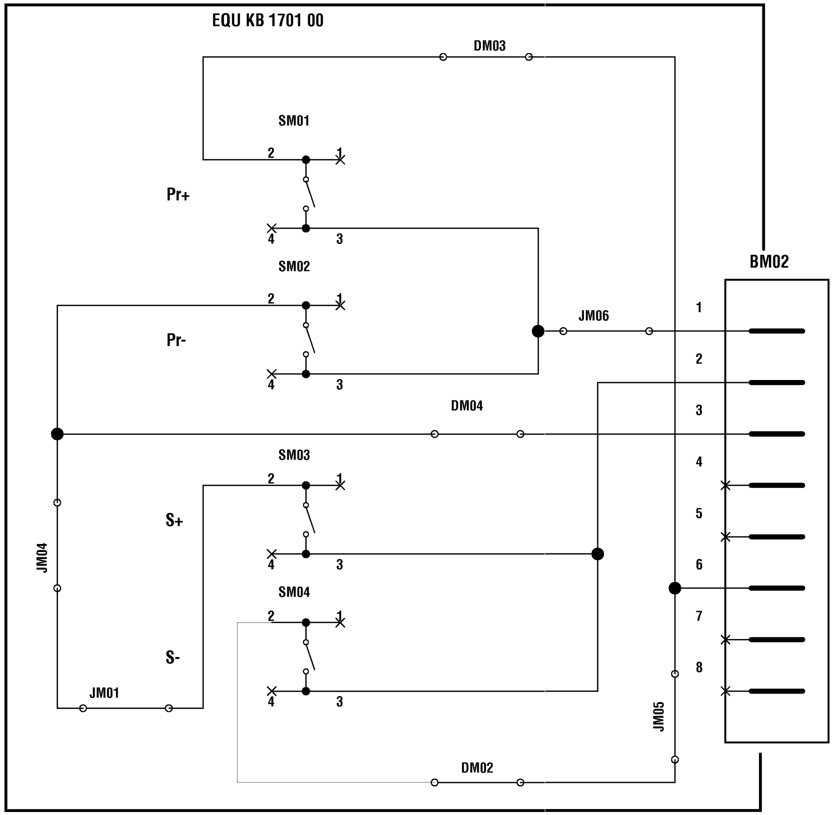
⚠ Piece de securite
N'utilisez que les pieces d'origine

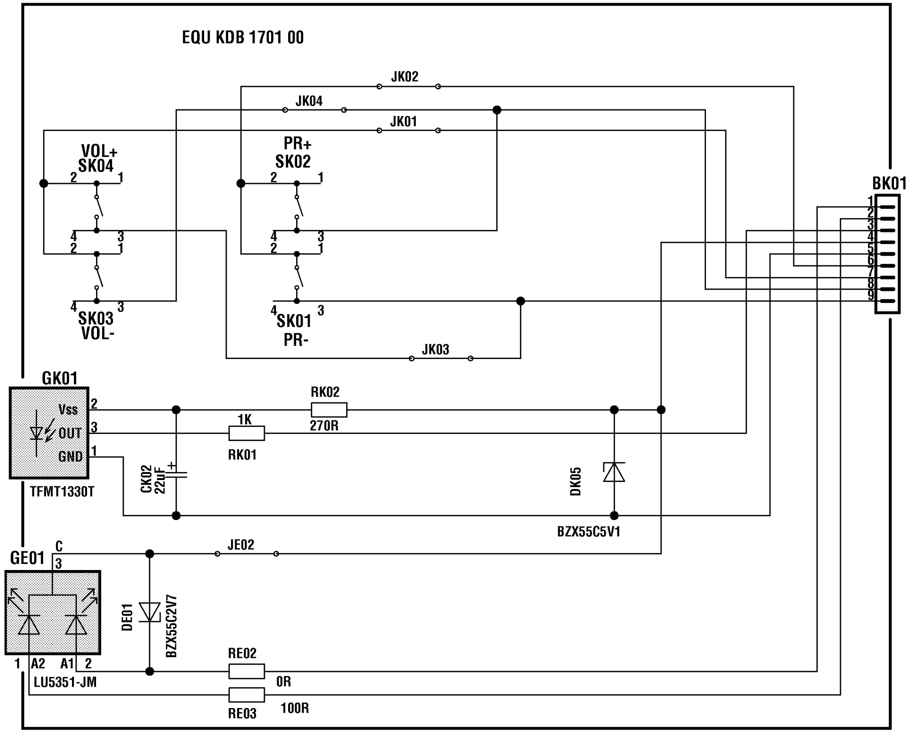
AUDIO SIGNAL MODULE DOLBY PROLOGIC - MODULE AUDIO DOLBY PROLOGIC - DOLBY PROLOGIC VERSTÄRKER - MODULO AUDIO DOLBY PROLOGIC
ESQUEMA DEL MÕDULO AMPLIFICADOR DE AUDIO

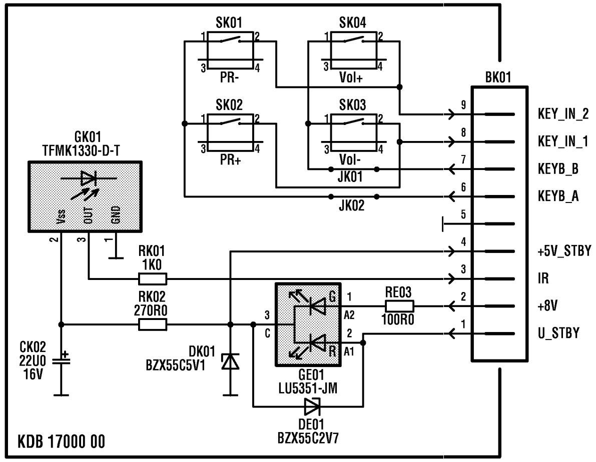

BA005 Cinch output
Left
Right
Subwoofer
Surround
BS003
SUB AMDP
BA001
Left
Gnd
Right
Subwoofer
Center
Mute L/R
Surround
Mute Surr.
Headph L
Headph R
BS02
ICC17
BA002
GND
+ UA
Mute
CA001 1N0
RA001 100K0
RA002 100K0
CA002 1N0
CA005 1N0
RA005 100K0
RA006 100K0
CA006 1N0
RA003 470R0
RA004 470R0
RA007 470R0
RA008 470R0
CA003 4U7
CA004 4U7
CA007 4U7
CA008 4U7
RA070 10K0
RA071 10K0
CA012 1N0
CA014 4U7
RA016 4K7
RA014 4K7
CA018 470P0
CA016 1U0
RA018 1K0
CA036 470U0
RA035 560R0
RA038 560R0
Right
Left
CA013 4U7
RA013 4K7
CA015 1U0
RA017 1K0
CA011 1N0
RA015 4K7
CA017 470P0
IA001 TDA7269
RA050 4R7
CA050 100N0
RA048 22K0
RA039 22K0
CA054 1MI0
CA043 1MI0
RA056 1K0
RA045 1K0
CA041 100N0
RA041 4R7
CA045 1N0
CA056 1N0
BA005
Right
Left
BA006
Right
BA007
Left
SA001
TA021 BC847B
RA021 18K0
DA023 BZX55C3V6
RA031 1K0
CA031 1MI0
CA033 100N0
RA023 15K0
RA027 100R0
CA023 1U0
RA025 18K0
RA029 15K0
RA150 100K0
Heatsink
DA070 LL4148
DA071 LL4148
RA072 10K0
RA073 120K0
RA074 4K7
DA074 LL4148
DA075 LL4148
RA080 120MI0
RA081 5K6
DA083 LL4148
CA074 100U0
DA073 LL4148
CA080 100U0
TA080 BC857B
RA082 6K8
RA083 5K6
RA076 22K0
TA072 BC847B
TA077 BC847B
RA077 22K0
RA079 10K0
RA078 1K2
CA078 100U0
CA035 470U0
RA036 560R0
RA037 560R0
RA049 4R7
CA049 100N0
RA047 22K0
CA053 470U0
RA055 1K0
CA058 22N0
CA060 22N0
BA005
Surround
CA090 1N0
CA092 4U7
RA094 4K7
RA092 4K7
CA096 470P0
CA094 1U0
RA096 1K0
Surround
Center
CA093 4U7
RA093 4K7
CA095 1U0
RA097 1K0
CA091 1N0
RA095 4K7
CA097 470P0
IA002 TDA7269
RA040 22K0
CA044 470U0
RA046 1K0
CA061 22N0
BA009
Center L
CA064 22N0
BA008
Center R
CA109 470U0
RA109 47K0
RA111 47K0
CA105 220U0
RA105 470R0
RA107 120K0
CA113 10U0
RA113 6K8
RA115 10K0
CA115 1N0
VCC
IN-
IN+
OUT
VEE
IA003 MC33076/P1
CA101 1N0
CA103 1U0
RA106 120K0
CA107 1N0
CA104 1U0
CA102 1N0
CA106 1N0
RA119 1K0
RA117 33R0
CA119 100U0
BA004
Left
Headphones
Right
RA116 33R0
CA118 100U0
RA118 1K0
RA112 6K8
RA114 10K0
CA114 1N0
CA112 10U0
RA032 1K0
RA028 100R0
DA024 BZX55C3V6
CA032 1MI0
CA034 100N0
CA042 100N0
RA042 4R7
RA030 18K0
RA026 10K0
RA024 15K0
CA024 1U0
TA022 BC847B
RA022 18K0
AMDP
AM/DP.17000.00
AUDIO MODULE DOLBY PROLOGIC

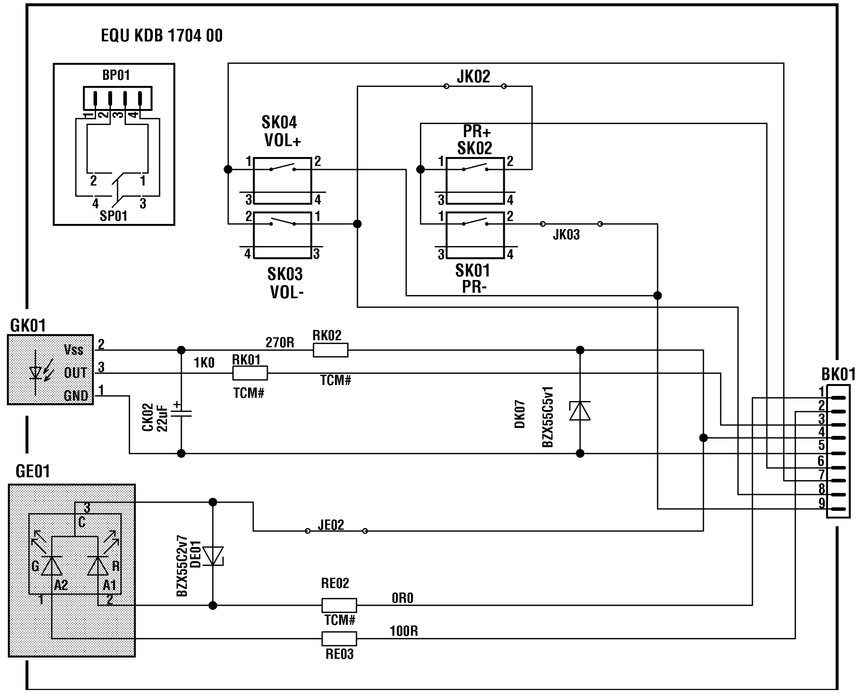
SUB AUDIO SIGNAL MODULE - SUB MODULE AUDIO - AUDIO SIGNAL SUBMODUL - SUB MODULO AUDIO

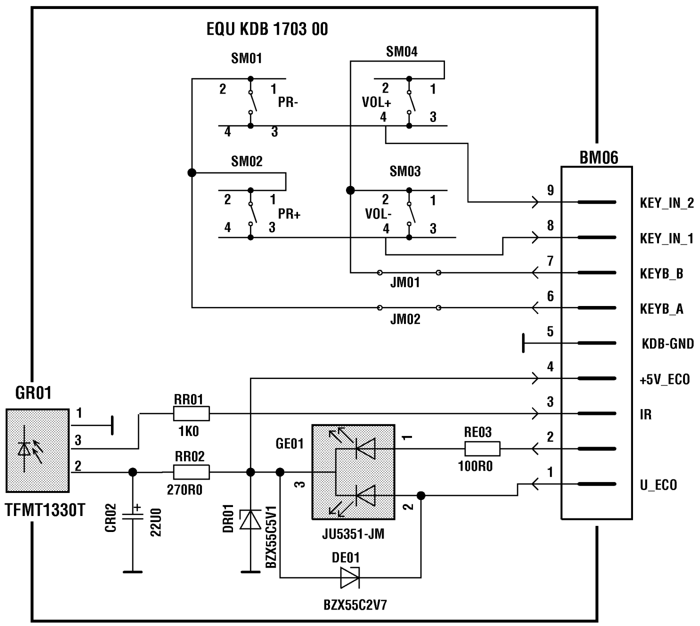

SUB AUDIO MODULE DOLBY PROLOGIC
BS002
PINS of MSP
64
58
55
33
DGND
XTALOUT
XTALIN
ANAIN2+
ANAIN-
ANAIN1+
+5VA
MONOIN
VREFTOP
SC1INR
SC1INL
SC2INR
SC2INL
SC3INR
SC3INL
SC4INR
SC4INL
AGNDC
CAPLM
CAPLA
SC1OUTL
SC1OUTR
SC2OUTL
SC2OUTR
AGND
+8V
SUB AMDP
SUB AMDP 17001 00
IS100
MSP3410D(DIE)
AHVSS
CAPLM
AHVSUP
AVHSUP
CAPLA
SC1OUTL
SC1OUTR
VREF1
SC2OUTL
SC2OUTR
ASG3
TESTNEU
DACMSUB
DACML
DACMR
VREF2
AVSUP
TESTEN
XTALOUT
DMACSYNC
AUDCLOUT
NP
DCTROUT1
DCTROUT0
ADRSEL
STANDBYQ
DACAL
DACAR
RESETQ
I2SDAIN2
DVSS
DVSUP
ADRCL
ADRWS
ADRDA
I2SDAIN1
I2SDAOU1
I2SWS
I2SCL
I2SCA
I2CCL
CS101
220N0
CS102
10N0
CS103
1N0
CS104
10N0
CS105
100N0
CS106
1N0
+5VD
IS200
DPL3518(DIE)
CAPLC1
CAPLC2
DACC1L
DACC1R
DACC2L
DACC2R
DCTRIN
DCTRIO1
DCTRIO0
XTALIN
CS201
220N0
CS202
10N0
CS203
1N0
CS204
10N0
CS205
100N0
CS206
10U0
CS207
100N0
CS208
3U3
CS209
100N0
CS210
10U0
CS211
10U0
TP1
TP2
DACMC
DACMSUB
DACMSURR
DACC2L
DACAR
DACAL
DACMR
DACML
I2CCL
I2CDA
BS001
1
32
Left
Right
Subwoofer
Center
Mute L/R
Surround
Mute Surr.
Headph L
Headph R
BS003
BA001
AMDP

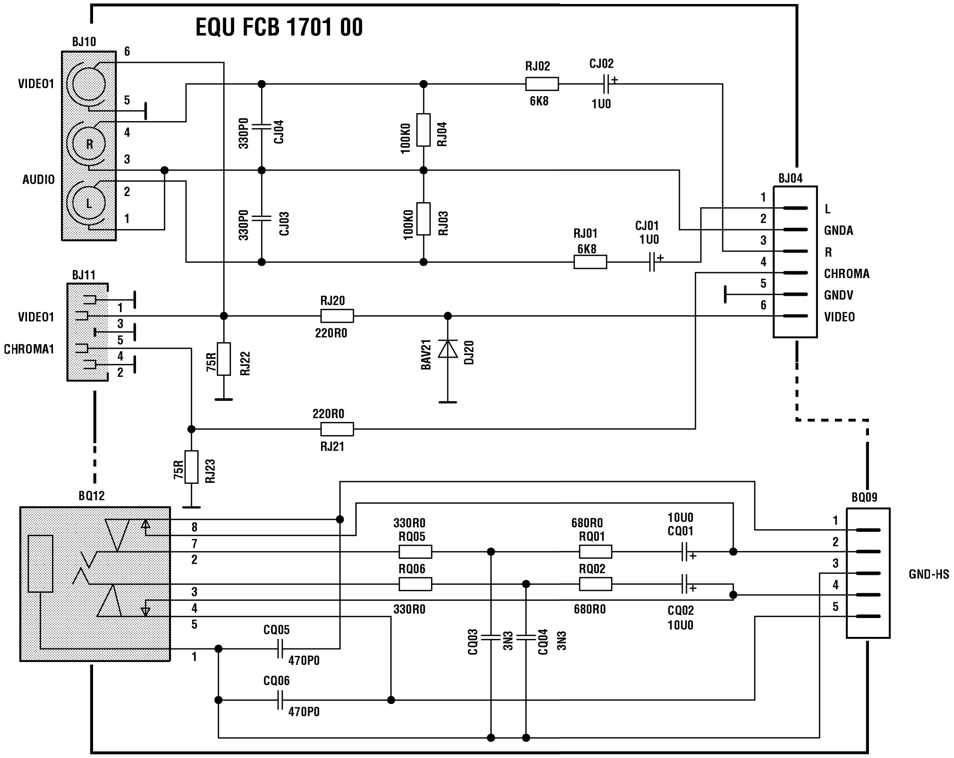

EQU KB 1701 00
DM03
SM01
Pr+
SM02
Pr-
JM06
DM04
SM03
S+
SM04
S-
JM04
JM01
JM05
DM02
BM02
1
2
3
4
5
6
7
8

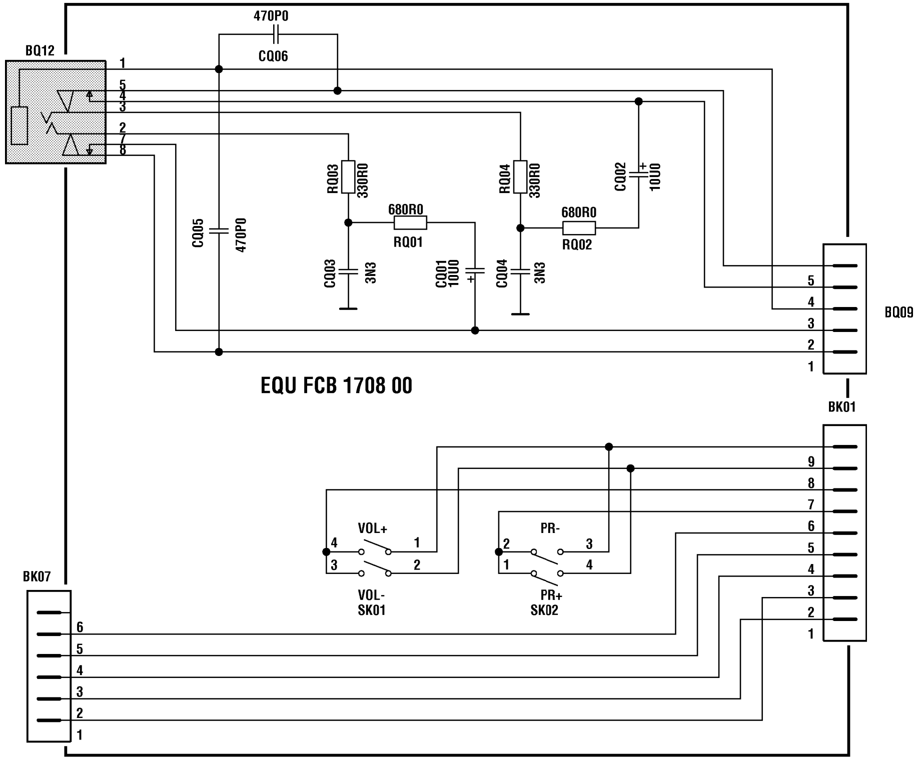

EQU KDB 1701 00
JK02
JK04
JK01
VOL+
SK04
PR+
SK02
SK03
VOL-
SK01
PR-
JK03
BK01
GK01
Vss
OUT
GND
TFMT1330T
CK02
22uF
1K
RK01
RK02
270R
DK05
BZX55C5V1
GE01
JE02
DE01
BZX55C2V7
A2
A1
LU5351-JM
RE02
0R
RE03
100R

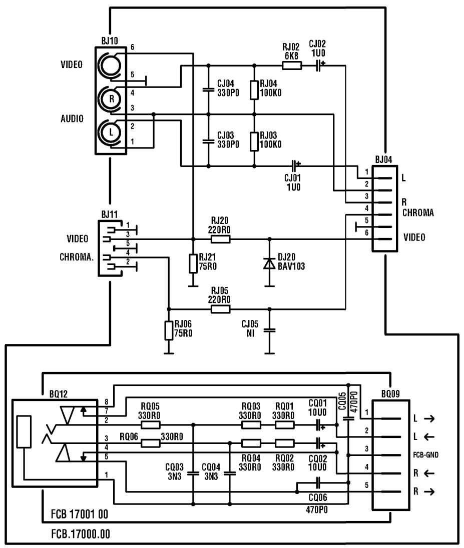

SK01
PR-
SK04
Vol+
SK02
PR+
SK03
Vol-
JK01
JK02
BK01
KEY_IN_2
KEY_IN_1
KEYB_B
KEYB_A
+5V_STBY
IR
+8V
U_STBY
GK01
TFMK1330-D-T
Vss
OUT
GND
RK01
1K0
RK02
270R0
CK02
22U0
16V
DK01
BZX55C5V1
GE01
LU5351-JM
RE03
100R0
DE01
BZX55C2V7
KDB 17000 00

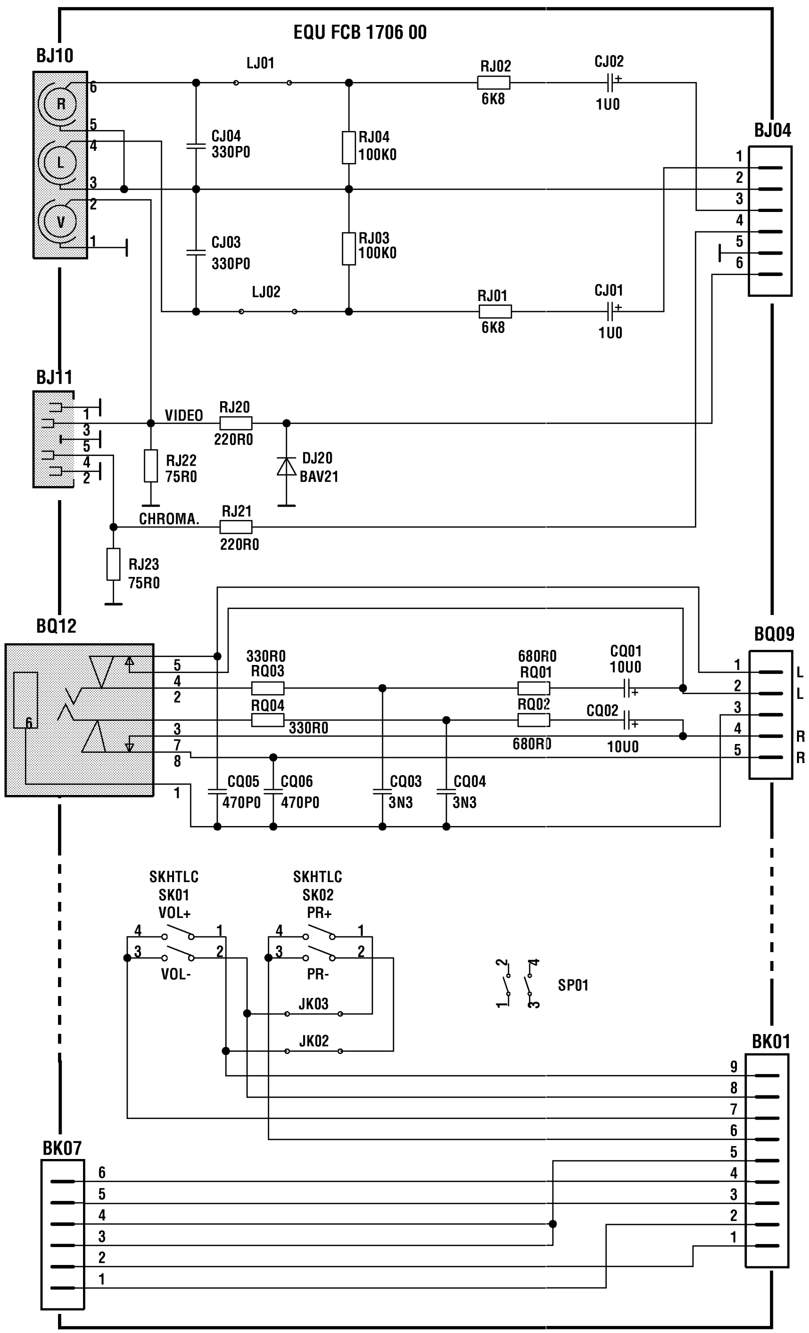

EQU KDB 1704 00
BP01
SP01
JK02
SK04
VOL+
PR+
SK02
JK03
SK03
VOL-
SK01
PR-
GK01
Vss
OUT
GND
270R
RK02
1K0
RK01
TCM#
CK02
22uF
DK07
BZX55C5v1
BK01
GE01
JE02
DE01
BZX55C2v7
A2
A1
RE02
0R0
RE03
100R

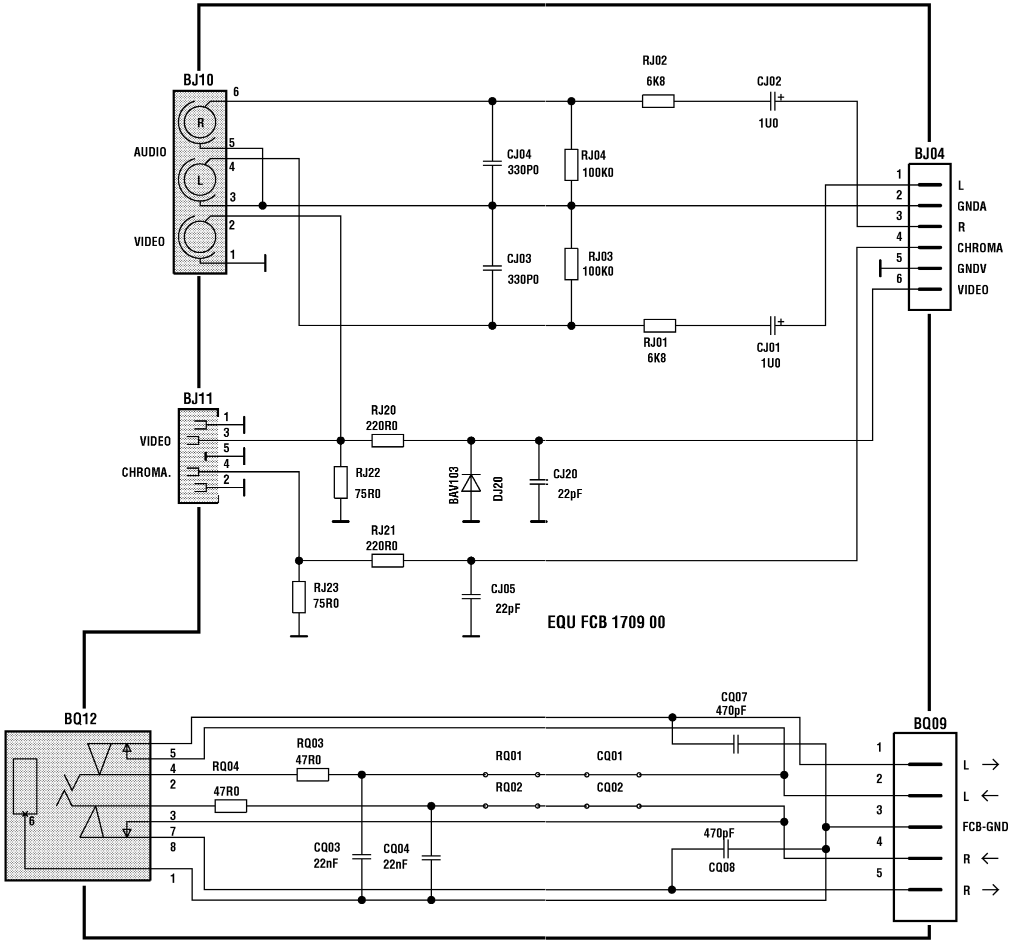

EQU KDB 1703 00
SM01
PR-
SM04
VOL+
SM02
PR+
SM03
VOL-
JM01
JM02
BM06
KEY_IN_2
KEY_IN_1
KEYB_B
KEYB_A
KDB-GND
+5V_ECO
IR
U_ECO
GR01
TFMT1330T
RR01
1K0
RR02
270R0
CR02
22U0
DR01
BZX55C5V1
GE01
JU5351-JM
RE03
100R0
DE01
BZX55C2V7

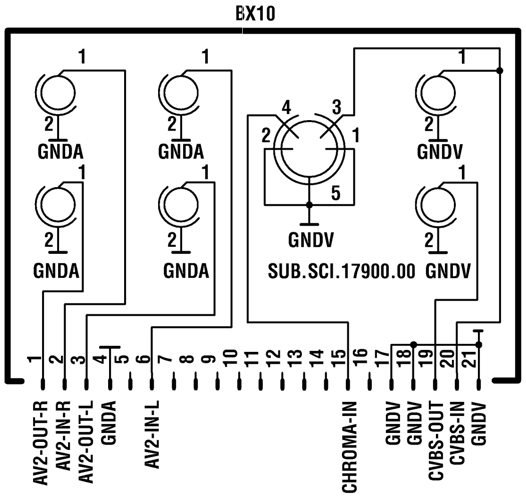

EQU FCB 1701 00
BJ10
VIDEO1
AUDIO
R
L
RJ02
6K8
CJ02
1U0
CJ04
330P0
RJ04
100K0
CJ03
330P0
RJ03
100K0
RJ01
6K8
CJ01
1U0
BJ04
L
GNDA
R
CHROMA
GNDV
VIDEO
BJ11
VIDEO1
CHROMA1
RJ20
220R0
BAV21
DJ20
75R
RJ22
220R0
RJ21
75R
RJ23
BQ12
330R0
RQ05
RQ06
330R0
680R0
RQ01
RQ02
680R0
10U0
CQ01
CQ02
10U0
CQ05
470P0
CQ06
470P0
CQ03
3N3
CQ04
3N3
BQ09
GND-HS

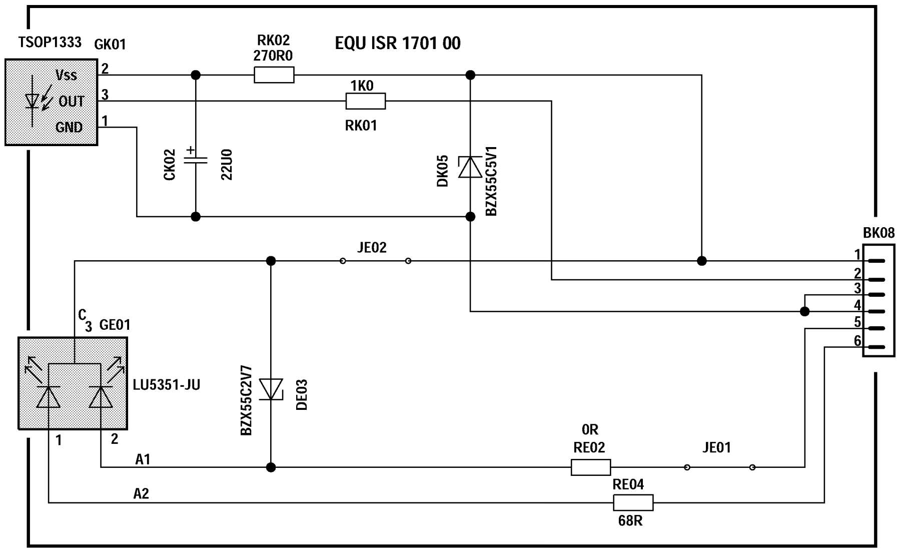

470P0
CQ06
BQ12
RQ03
330R0
RQ04
330R0
CQ02
10U0
680R0
RQ01
680R0
RQ02
CQ05
470P0
CQ03
3N3
CQ01
10U0
CQ04
3N3
BQ09
EQU FCB 1708 00
BK01
VOL+
VOL-
SK01
PR-
PR+
SK02
BK07

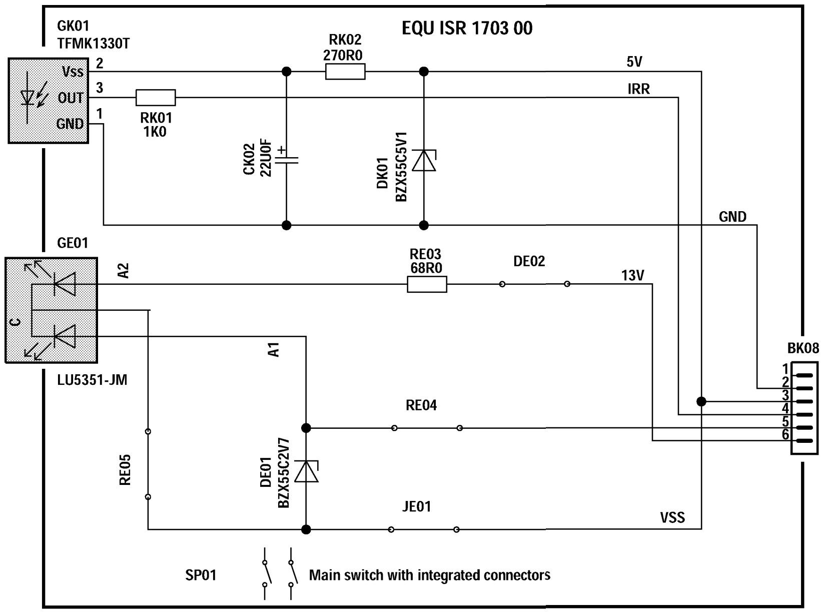

BJ10
VIDEO
AUDIO
R
L
RJ02
6K8
CJ02
1U0
CJ04
330P0
RJ04
100K0
CJ03
330P0
RJ03
100K0
CJ01
1U0
BJ04
L
R
CHROMA
VIDEO
BJ11
VIDEO
CHROMA.
RJ20
220R0
RJ21
75R0
DJ20
BAV103
RJ05
220R0
RJ06
75R0
CJ05
NI
BQ12
RQ05
330R0
RQ06
330R0
RQ03
330R0
RQ01
330R0
CQ01
10U0
CQ05
470P0
RQ04
330R0
RQ02
330R0
CQ02
10U0
CQ03
3N3
CQ04
3N3
CQ06
470P0
BQ09
L →
L ←
FCB-GND
R ←
R →
FCB 17001 00
FCB.17000.00

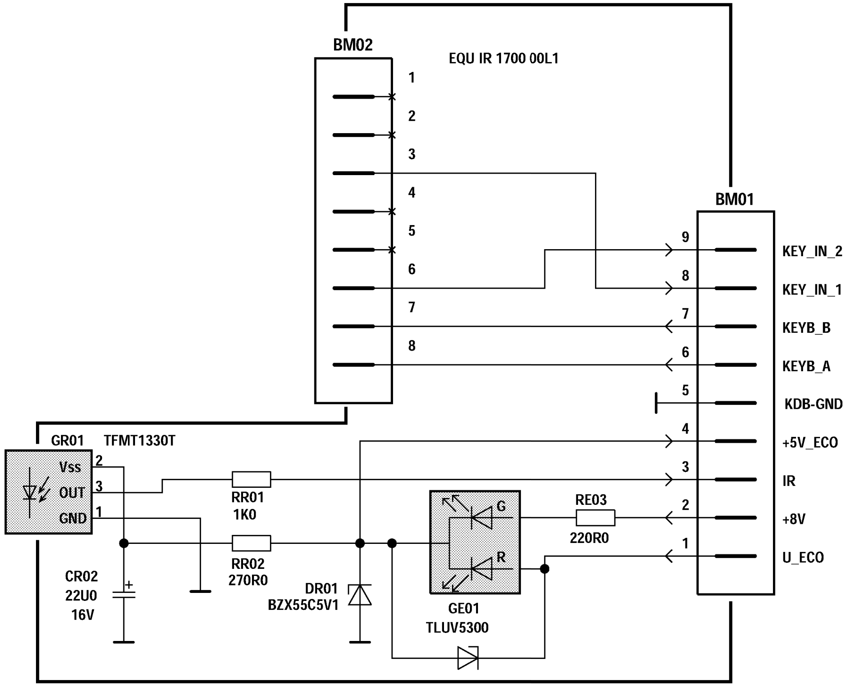

EQU FCB 1706 00
BJ10
R
L
V
LJ01
LJ02
RJ02
6K8
CJ02
1U0
CJ04
330P0
CJ03
330P0
RJ04
100K0
RJ03
100K0
RJ01
6K8
CJ01
1U0
BJ04
BJ11
VIDEO
RJ20
220R0
DJ20
BAV21
RJ22
75R0
CHROMA.
RJ21
220R0
RJ23
75R0
BQ12
330R0
RQ03
RQ04
330R0
680R0
RQ01
RQ02
680R0
CQ01
10U0
CQ02
10U0
BQ09
L
L
R
R
CQ05
470P0
CQ06
470P0
CQ03
3N3
CQ04
3N3
SKHTLC
SK01
VOL+
VOL-
SKHTLC
SK02
PR+
PR-
JK03
JK02
SP01
BK01
BK07


BJ10
AUDIO
VIDEO
R
L
RJ02
6K8
CJ02
1U0
CJ04
330P0
CJ03
330P0
RJ04
100K0
RJ03
100K0
RJ01
6K8
CJ01
1U0
BJ04
L
GNDA
R
CHROMA
GNDV
VIDEO
BJ11
VIDEO
CHROMA.
RJ20
220R0
RJ22
75R0
BAV103
DJ20
CJ20
22pF
RJ21
220R0
RJ23
75R0
CJ05
22pF
EQU FCB 1709 00
BQ12
RQ03
47R0
RQ04
47R0
RQ01
CQ01
RQ02
CQ02
CQ07
470pF
470pF
CQ08
CQ03
22nF
CQ04
22nF
BQ09
L →
L ←
FCB-GND
R ←
R →

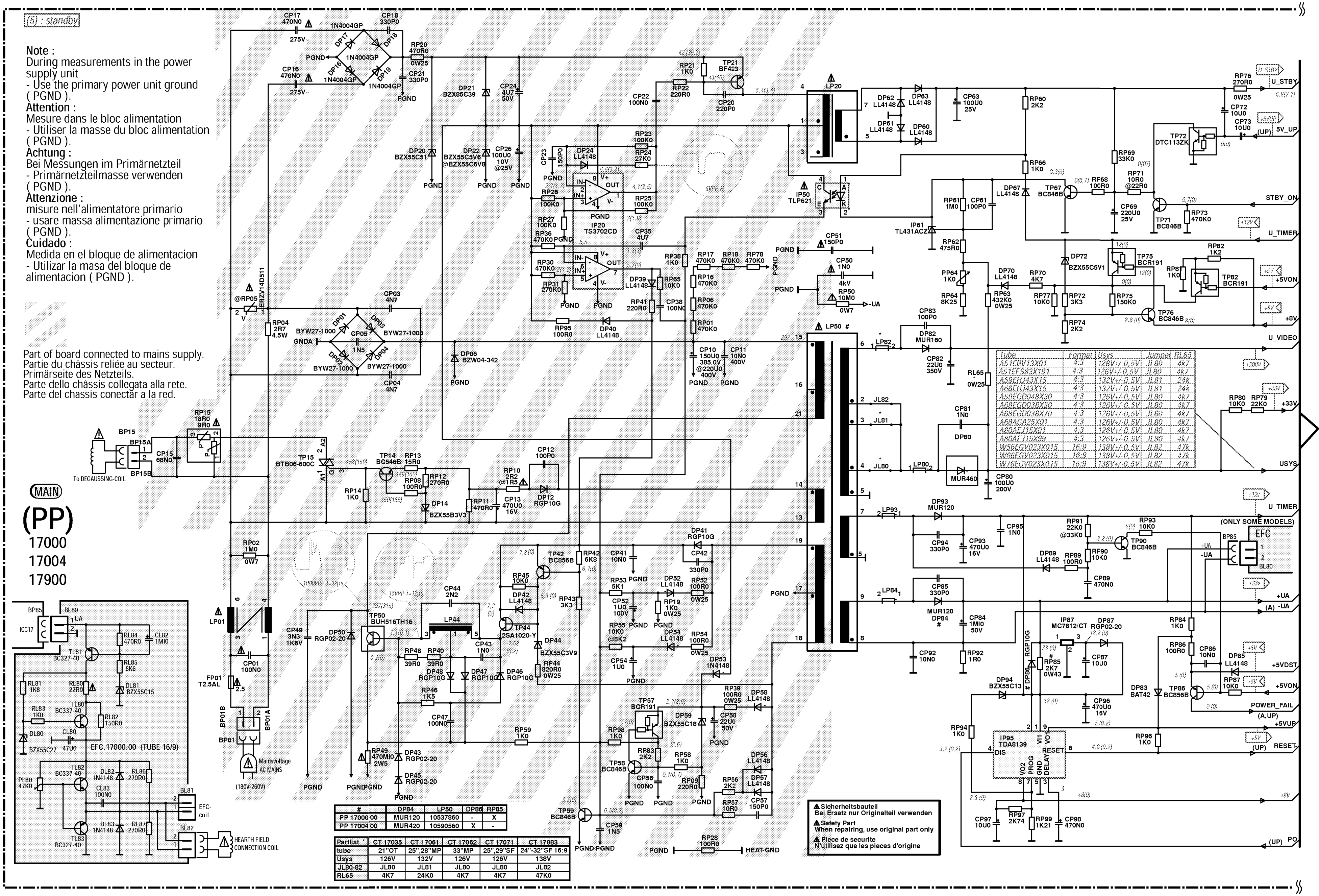

BX10
GNDA
GNDA
GNDV
GNDA
GNDA
GNDV
SUB.SCI.17900.00
GNDV
GNDV
AV2-OUT-R
AV2-IN-R
AV2-OUT-L
GNDA
AV2-IN-L
CHROMA-IN
GNDV
GNDV
CVBS-OUT
CVBS-IN
GNDV


EQU ISR 1701 00
TSOP1333
GK01
Vss
OUT
GND
2
3
1
RK02
270R0
1K0
RK01
CK02
22U0
DK05
BZX55C5V1
BK08
1
2
3
4
5
6
JE02
C
3
GE01
LU5351-JU
BZX55C2V7
DE03
1
2
A1
A2
0R
RE02
JE01
RE04
68R


GK01
TFMK1330T
EQU ISR 1703 00
Vss
OUT
GND
2
3
1
RK02
270R0
5V
RK01
1K0
IRR
CK02
22U0F
DK01
BZX55C5V1
GND
GE01
A2
RE03
68R0
DE02
13V
C
A1
BK08
1
2
3
4
5
6
LU5351-JM
RE04
RE05
DE01
BZX55C2V7
JE01
VSS
SP01
Main switch with integrated connectors


BM02
EQU IR 1700 00L1
1
2
3
4
5
6
7
8
BM01
9
8
7
6
5
4
3
2
1
KEY_IN_2
KEY_IN_1
KEYB_B
KEYB_A
KDB-GND
+5V_ECO
IR
+8V
U_ECO
GR01
TFMT1330T
Vss
OUT
GND
2
3
1
RR01
1K0
RR02
270R0
CR02
22U0
16V
DR01
BZX55C5V1
G
R
GE01
TLUV5300
RE03
220R0

POWER SUPPLY - ALIMENTATION - NETZTEIL - ALIMENTAZIONE - ALIMENTACIÓN


(5) : standby
(MAIN)
(PP)
17000
17004
17900
To DEGAUSSING-COIL
EFC.17000.00 (TUBE 16/9)
EFC-coil
HEARTH FIELD CONNECTION COIL
Mainsvoltage AC MAINS
(180V-260V)
LP50
LP20
IP20 TS3702CD
IP50 TLP621
IP61 TL431ACZ
IP87 MC7812/CT
IP95 TDA8139
TP50 BUH516TH16
U_STBY
5V_UP
STBY_ON
U_TIMER
+5VON
+8V
U_VIDEO
+33V
USYS
(ONLY SOME MODELS)
+UA
-UA
+5VDST
POWER_FAIL
+5VUP
RESET
PO
PGND
HEAT-GND

Note :
During measurements in the power supply unit
- Use the primary power unit ground (PGND).

Attention :
Mesure dans le bloc alimentation
- Utiliser la masse du bloc alimentation (PGND).

Achtung :
Bei Messungen im Primärnetzteil
- Primärnetzteilmasse verwenden (PGND).

Attenzione :
misure nell'alimentatore primario
- usare massa alimentazione primario (PGND).

Cuidado :
Medida en el bloque de alimentacion
- Utilizar la masa del bloque de alimentacion (PGND).

Part of board connected to mains supply.
Partie du châssis reliée au secteur.
Primärseite des Netzteils.
Parte dello châssis collegata alla rete.
Parte del chassis conectar a la red.

Tube	Format	Usys	Jumper	RL65
A51EBV13X01	4:3	128V+/-0,5V	JL80	4k7
A51EFS83X191	4:3	126V+/-0,5V	JL80	4k7
A59EHJ43X15	4:3	132V+/-0,5V	JL81	24k
A66EHJ43X15	4:3	132V+/-0,5V	JL81	24k
A59EGD048X30	4:3	126V+/-0,5V	JL80	4k7
A68EGD038X30	4:3	126V+/-0,5V	JL80	4k7
A68EGD038X70	4:3	126V+/-0,5V	JL80	4k7
A68AGA25X01	4:3	126V+/-0,5V	JL80	4k7
A80AEJ15X01	4:3	126V+/-0,5V	JL80	4k7
A80AEJ15X99	4:3	126V+/-0,5V	JL80	4k7
W56EGV023X015	16:9	138V+/-0,5V	JL82	47k
W66EGV023X015	16:9	138V+/-0,5V	JL82	47k
W76EGV023X015	16:9	138V+/-0,5V	JL82	47k

#	DP84	LP50	DP86	RP85
PP 17000 00	MUR120	10537860	-	X
PP 17004 00	MUR420	10590560	X	-

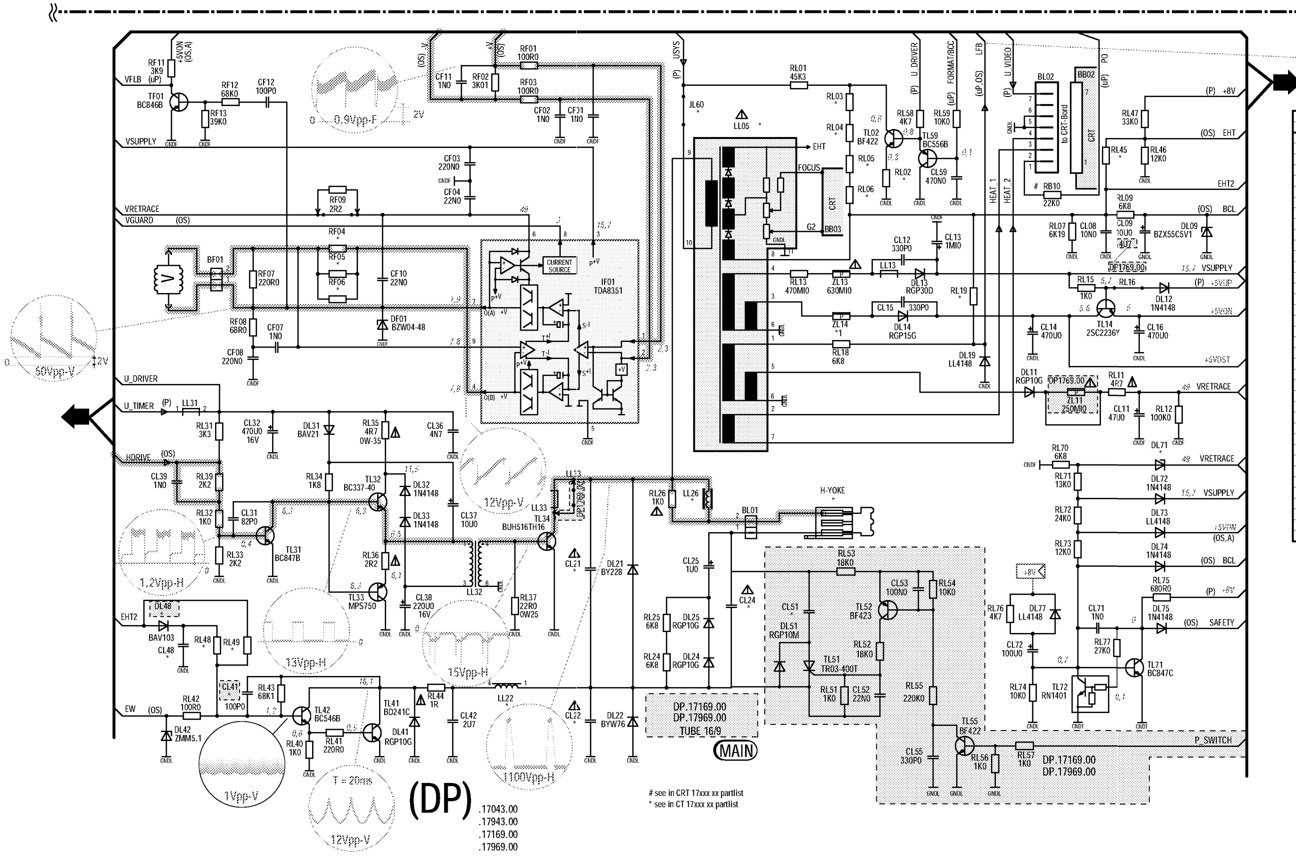
Partlist *	CT 17035	CT 17061	CT 17062	CT 17071	CT 17083
tube	21"OT	25",28"MP	33"MP	25",29"SF	24"-32"SF 16:9
Usys	126V	132V	126V	126V	138V
JL80-82	JL80	JL81	JL80	JL80	JL82
RL65	4K7	24K0	4K7	4K7	47K0

⚠ **Sicherheitsbauteil**
Bei Ersatz nur Originalteil verwenden

⚠ **Safety Part**
When repairing, use original part only

⚠ **Piece de securite**
N'utilisez que les pieces d'origine

SCANNING - BALAYAGE - ABLENKUNG - BARRIDO - SCANSIONE



	TV PSD CT 17062 26
	TV ASY A80AEJ15X01 (A) 00
CL21	16N2F +3.5% -3.5% 1K6V
CL21	16N5F +3.5% -3.5% 2K0V
CL21A	16N5F +3.5% -3.5% 1K6V
CL22	30N0F +5% -5% 400.0V
CL22	30N0F +5% -5% 1K0V
CL24	560N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	10N0F +10% 63.0V
CL48	10N0F +10% 100.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55B24 24V 500MI0W
DL71	D-ZENER BZX55C24 24V 500MI0W
DL71	D-ZENER BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0% 100MI0W
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29
LL22	LF 650U0H +5% -5%
LL22	LF 650U0H +5% -5% EAST-WEST
LL26	LL 26U5H +10%
LL26	LL 22U0H +10%
RF05	1R0 OHM +1% 700MI0W
RF05	1R21 OHM +1% 700MI0W
RF06	10R0 OHM +1% +100PPM/'C 100MI0W
RL02	6K2 OHM +5% 100MI0W 1004 A3 00
RL02	6K04 OHM +1% +100PPM/'C 100MI0W
RL03	4K75 OHM +1% +100PPM/'C 100MI0W
RL04	4K75 OHM +1% +100PPM/'C 100MI0W
RL05	4K75 OHM +1% +100PPM/'C 100MI0W
RL06	6K81 OHM +1% +100PPM/'C 100MI0W
RL06	10K0 OHM +1% +100PPM/'C 100MI0W
RL19	13K0 OHM +5% 100MI0W
RL45	150K0 OHM +5% 100MI0W
RL48	76K8 OHM +1% +100PPM/'C 100MI0W
RL49	560K0 OHM +5% 100MI0W
RL65	4K7 OHM +5% 250MI0W
RV20	23K7 OHM +1% 250MI0W
RV20	33K2 OHM +1% 250MI0W

	TV PSD CT 17035 26
	TV ASY A51EFS83X191 03
CL21	8N3F +3.5% -3.5% 2K0V
CL21	8N3F +3.5% -3.5% 1K6V
CL21	8N8F +3.5% -3.5% 1K6V
CL21A	8N3F +3.5% -3.5% 1K6V
CL22	33N0F +5% -5% 400.0V
CL22	30N0F +5% -5% 400.0V
CL22	33N0F +5% -5% 1K0V
CL24	440N0F +5% -5% 400.0V
CL24	440N0F +5% -5% 250.0V
CL24	440N0F +5% -5% 250.0V
CL24A	440N0F +5% -5% 250.0V
CL41	1N0F +10% -10% 50.0V
CL48	100N0F +5% 63.0V
DL71	D-ZENER BZX55C20 20V 500MI0W
DL71	D-ZENER BZX55C24 24V 500MI0W
DL71	D-ZENER BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0%
JP81	0 OHM +0%
LB02	LF 18U0H +7% -7%
LB02	LF 21U0H +5% -5%
LL05	F-DST M30FBC3 10555640 3087
LL22	LF 650U0H +5% -5%
LL22	LF 650U0H +5% -5% EAST-WEST
LL26	LL 85U0H 2519 A0
LL26	LL 39U0H +10%
RF04	1R21 OHM +1% 700MI0W
RF05	1R21 OHM +1% 700MI0W
RF05	1R5 OHM +1% 700MI0W
RF06	10R0 OHM +1% +100PPM/'C
RL02	6K2 OHM +5%
RL02	6K04 OHM +1% +100PPM/'C
RL03	10K0 OHM +1% +100PPM/'C
RL04	10K0 OHM +1% +100PPM/'C
RL04	20K0 OHM +1% +100PPM/'C
RL05	10K0 OHM +1% +100PPM/'C
RL0	20K0 OHM +1% +100PPM/'C
RL06	10K0 OHM +1% +100PPM/'C
RL06	3K32 OHM +1% +100PPM/'C
RL11	4R7 OHM +10% 250MI0W
RL11	4R7 OHM +5% 250MI0W
RL19	18K0 OHM +5%
RL43	68K1 OHM +1% 250MI0W
RL43	68K1 OHM +1% +100PPM/'C
RL45	82K0 OHM +5%
RL45	110K0 OHM +5%
RL45	470K0 OHM +5%
RL46	12K0 OHM +5%
RL47	33K0 OHM +5%
RL48	100K0 OHM +1% +100PPM/'C
RL49	76K8 OHM +1% +100PPM/'C
RL49	60K4 OHM +1% +100PPM/'C
RL64	8K25 OHM +1% +100PPM/'C
RL65	4K7 OHM +5% 250MI0W
RV20	3K7 OHM +1% 250MI0W
RV20	33K2 OHM +1% 250MI0W
RV20	33K2 OHM +1% +100PPM/'C
ZL13	MP63 630MI0 A 65.0V

	TV ASY A59EHJ43X15 00
	TV ASY A66EHJ43X15 00
	TV PSD CT 17061 32
CL21	14N4F +3.5% -3.5% 1K6V
CL21	14N4F +3.5% -3.5% 1K6V
CL21	14N0F +3.5% -3.5% 1K5V
CL22	30N0F +5% -5% 400.0V
CL22	30N0F +5% -5% 400.0V
CL22	30N0F +5% -5% 1K0V
CL24	440N0F +5% -5% 400.0V
CL24	470N0F +5% -5% 250.0V
CL24	440N0F +5% -5% 250.0V
CL24	440N0F +5% -5% 250.0V
CL24A	440N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	10N0F +10% 63.0V
CL48	10N0F +10% 100.0V
DL48	BAV103 200.0V
DL71	BZX55B24 24V 500MI0W
DL71	BZX55C24 24V 500MI0W
DL71	BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL81	0 OHM +0% 100MI0W
JP80	0 OHM +0% 100MI0W
LB02	13U5H +5% -5%
LB02	18U0H +7% -7%
LB02	21U0H +5% -5%
LB02	21U0H +5% -5%
LL05	TF-DST M30FBC3 10546610 3087
LL05	TF-DST M30FBC3 10600190 3087
LL05	TF-DST M30FBC3 10608680 3087
LL22	650U0H +5% -5%
LL22	650U0H +5% -5% EAST-WEST
LL26	26U5H +10%
LL26	30U5H 2519 A0
RF04	1R21 OHM +1% 700MI0W
RF05	1R0 OHM +1% 700MI0W
RF05	1R21 OHM +1% 700MI0W
RF06	12R1 OHM +1% +100PPM/'C 100MI0W
RL02	10K0 OHM +5% 100MI0W
RL02	6K04 OHM +1% +100PPM/'C 100MI0W
RL02	499R0 OHM +1% +100PPM/'C 100MI0W
RL03	10K0 OHM +1% +100PPM/'C 100MI0W
RL03	11K5 OHM +1% +100PPM/'C 100MI0W
RL04	10K0 OHM +1% +100PPM/'C 100MI0W
RL04	20K0 OHM +1% +100PPM/'C 100MI0W
RL04	11K5 OHM +1% +100PPM/'C 100MI0W
RL05	10K0 OHM +1% +100PPM/'C 100MI0W
RL05	20K0 OHM +1% +100PPM/'C 100MI0W
RL05	11K5 OHM +1% +100PPM/'C 100MI0W
RL06	8K25 OHM +1% +100PPM/'C 100MI0W
RL06	4K75 OHM +1% +100PPM/'C 100MI0W
RL06	9K09 OHM +1% +100PPM/'C 100MI0W
RL06	11K5 OHM +1% +100PPM/'C 100MI0W
RL11	4R7 OHM +10% 250MI0W
RL11	4R7 OHM +5% 250MI0W
RL19	22K0 OHM +5% 100MI0W
RL19	33K0 OHM +5% 100MI0W
RL43	68K1 OHM +1% 250MI0W
RL43	68K1 OHM +1% 250MI0W
RL43	68K1 OHM +1% +100PPM/'C 100MI0W
RL45	180K0 OHM +5% 100MI0W
RL45	270K0 OHM +5% 100MI0W
RL46	12K0 OHM +5% 100MI0W
RL47	33K0 OHM +5% 100MI0W
RL48	76K8 OHM +1% +100PPM/'C 100MI0W
RL48	60K4 OHM +1% +100PPM/'C 100MI0W
RL64	8K25 OHM +1% +100PPM/'C 100MI0W
RL65	24K0 OHM +5% 250MI0W
RV20	33K2 OHM +1% 250MI0W
RV20	33K2 OHM +1% +100PPM/'C 100MI0W
ZL13	MP63 630MI0 A 65.0V

	TV PSD CT 17083 38
	TV ASY W56EGV023X015 56 01
	TV ASY W56EGV023X015 56 01
	TV ASY W66EGV023X015 66 00
	TV ASY W66EGV023X015 66 00
	TV ASY W66EGV023X015 66 01
	TV ASY W76EGV023X015 (A) 00
	TV ASY W76EGV023X015 (A) 00
CL2	14N4F +3.5% -3.5% 1K6V
CL21	15N5F +3.5% -3.5% 1K6V
CL21	15N0F +3.5% -3.5% 2K0V
CL21A	15N0F +3.5% -3.5% 1K6V
CL22	27N0F +5% -5% 400.0V
CL22	27N0F +5% -5% 1K0V
CL24	440N0F +5% -5% 250.0V
CL24	440N0F +5% -5% 400.0V
CL24	440N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	100N0F +5% 63.0V
CL51	90N0F +5% -5% 250.0V
CL51	290N0F +5% -5% 400.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55C20 20V 500MI0W
DL71	D-ZENER BZX55C24 24V 500MI0W
JL60	WIREBARE 22
JL82	0 OHM +0%
JP80	0 OHM +0%
JP81	0 OHM +0%
LB02	LF 29U0H +4% -4%
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29
LL22	LF 650U0H +5% -5%
LL22	LF 650U0H +5% -5% EAST-WEST
LL26	LL 26U5H +10%
LL26	LL 30U5H 2519 A0
RF04	1R21 OHM +1% 700MI0W
RF05	1R21 OHM +1% 700MI0W
RF05	1R5 OHM +1% 700MI0W
RF06	10R0 OHM +1% +100PPM/'C
RL02	4K99 OHM +1% +100PPM/'C
RL02	4K75 OHM +1% +100PPM/'C
RL02	6K04 OHM +1% +100PPM/'C
RL03	6K49 OHM +1% +100PPM/'C
RL03	8K87 OHM +1% +100PPM/'C
RL04	6K49 OHM +1% +100PPM/'C
RL04	8K87 OHM +1% +100PPM/'C
RL04	10K0 OHM +1% +100PPM/'C
RL05	6K49 OHM +1% +100PPM/'C
RL05	8K87 OHM +1% +100PPM/'C
RL05	10K0 OHM +1% +100PPM/'C
RL06	6K49 OHM +1% +100PPM/'C
RL06	8K87 OHM +1% +100PPM/'C
RL06	3K32 OHM +1% +100PPM/'C
RL06	2K37 OHM +1% +100PPM/'C
RL11	4R7 OHM +10% 250MI0W
RL11	4R7 OHM +5% 250MI0W
RL19	15K0 OHM +5%
RL19	13K0 OHM +5%
RL43	68K1 OHM +1% 250MI0W
RL43	68K1 OHM +1% +100PPM/'C
RL45	470K0 OHM +5%
RL45	390K0 OHM +5%
RL46	12K0 OHM +5%
RL47	33K0 OHM +5%
RL48	1K0 OHM +5%
RL48	220K0 OHM +5%
RL48	237K0 OHM +1% +100PPM/'C
RL49	180K0 OHM +5%
RL49	143K0 OHM +1% +100PPM/'C
RL64	8K25 OHM +1% +100PPM/'C
RL65	47K0 OHM +5% 250MI0W
RV20	100K0 OHM +1% 250MI0W
RV20	33K2 OHM +1% +100PPM/'C
RV20	100K0 OHM +1% 250MI0W
ZL13	MP63 630MI0 A 65.0V

	TV ASY A66EHJ43X85 01
	TV PSD CT 17961 32
CL21	CFS 14N4F +3.5% -3.5% 1K6V
CL21	CFS 14N4F +3.5% -3.5% 1K6V
CL22	CFS 30N0F +5% -5% 400.0V
CL22	CFS 30N0F +5% -5% 1K0V
CL24	CFS 440N0F +5% -5% 400.0V
CL24	CFS 440N0F +5% -5% 250.0V
CL24A	CFS 440N0F +5% -5% 250.0V
CL41	CCCMIN 100P0F +10% -10% 50.0V
CL48	CPM 10N0F +10% 100.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55B24 24V 500MI0W
DL71	D-ZENER BZX55C24 24V 500MI0W
JL60	WIREBARE 22
JL81	RCFCCMIN 0 OHM +0% 100MI0W
LB02	LF 21U0H +5% -5%
LL05	TF-DST M30FBC3 10600190 3087
LL05	TF-DST M30FBC3 10608680 3087
LL22	LF 650U0H +5% -5%
LL22	LF 650U0H +5% -5% EAST-WEST
LL26	LL 26U5H +10%
RF05	RMF 1R0 OHM +1% 700MI0W
RL02	RCFCCMIN 10K0 OHM +5% 100MI0W
RL03	RMFCCMIN 10K0 OHM +1% +100PPM/'C 100MI0W
RL04	RMFCCMIN 10K0 OHM +1% +100PPM/'C 100MI0W
RL05	RMFCCMIN 10K0 OHM +1% +100PPM/'C 100MI0W
RL06	RMFCCMIN 8K25 OHM +1% +100PPM/'C 100MI0W
RL06	RMFCCMIN 4K75 OHM +1% +100PPM/'C 100MI0W
RL06	RMFCCMIN 9K09 OHM +1% +100PPM/'C 100MI0W
RL19	RCFCCMIN 22K0 OHM +5% 100MI0W
RL45	RCFCCMIN 180K0 OHM +5% 100MI0W
RL48	RMFCCMIN 76K8 OHM +1% +100PPM/'C 100MI0W
RL65	RCF 24K0 OHM +5% 250MI0W
RV20	RMF 33K2 OHM +1% 250MI0W

	TV ASY A68EGD038X70 (A) 68 00
	TV PSD CT 17971 26
CL21	16N2F +3.5% -3.5% 1K6V
CL21	16N2F +3.5% -3.5% 2K0V
CL21A	16N2F +3.5% -3.5% 1K6V
CL22	30N0F +5% -5% 400.0V
CL22	30N0F +5% -5% 1K0V
CL24	510N0F +5% -5% 250.0V
CL24	510N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	10N0F +10% 100.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55B24 24V 500MI0W
DL71	D-ZENER BZX55C24 24V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0% 100MI0W
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29
LL22	LF 650U0H +5% -5%
LL22	LF 650U0H +5% -5% EAST-WEST
LL26	LL 26U5H +10%
LL26	LL 22U0H +10%
RF05	1R0 OHM +1% 700MI0W
RL02	6K8 OHM +5% 100MI0W 1004 A3 00
RL03	4K75 OHM +1% +100PPM/'C 100MI0W
RL04	4K75 OHM +1% +100PPM/'C 100MI0W
RL05	4K75 OHM +1% +100PPM/'C 100MI0W
RL06	4K75 OHM +1% +100PPM/'C 100MI0W
RL19	15K0 OHM +5% 100MI0W
RL45	180K0 OHM +5% 100MI0W
RL48	100K0 OHM +5% 100MI0W
RL49	300K0 OHM +5% 100MI0W
RL65	4K7 OHM +5% 250MI0W
RV20	33K2 OHM +1% 250MI0W

	TV PSD CT 17962 26
	TV ASY A80AEJ15X99 80 00
CL21	16N5F +3.5% -3.5% 2K0V
CL21A	16N5F +3.5% -3.5% 1K6V
CL22	30N0F +5% -5% 1K0V
CL24	560N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	10N0F +10% 100.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55B24 24V 500MI0W
DL71	D-ZENER BZX55C24 24V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0%
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29
LL22	LF 650U0H +5% -5%
LL22	LF 650U0H +5% -5% EAST-WEST
LL26	LL 22U0H +10%
RF05	1R0 OHM +1% 700MI0W
RL02	6K2 OHM +5%
RL03	4K75 OHM +1% +100PPM/'C
RL04	4K75 OHM +1% +100PPM/'C
RL05	4K75 OHM +1% +100PPM/'C
RL06	10K0 OHM +1% +100PPM/'C
RL19	13K0 OHM +5%
RL45	150K0 OHM +5%
RL48	76K8 OHM +1% +100PPM/'C
RL49	560K0 OHM +5%
RL65	4K7 OHM +5% 250MI0W
RV20	33K2 OHM +1% 250MI0W

⚠ Indicates critical safety components, and identical components should be used for replacement. Only then can the operational safety be garanteed.

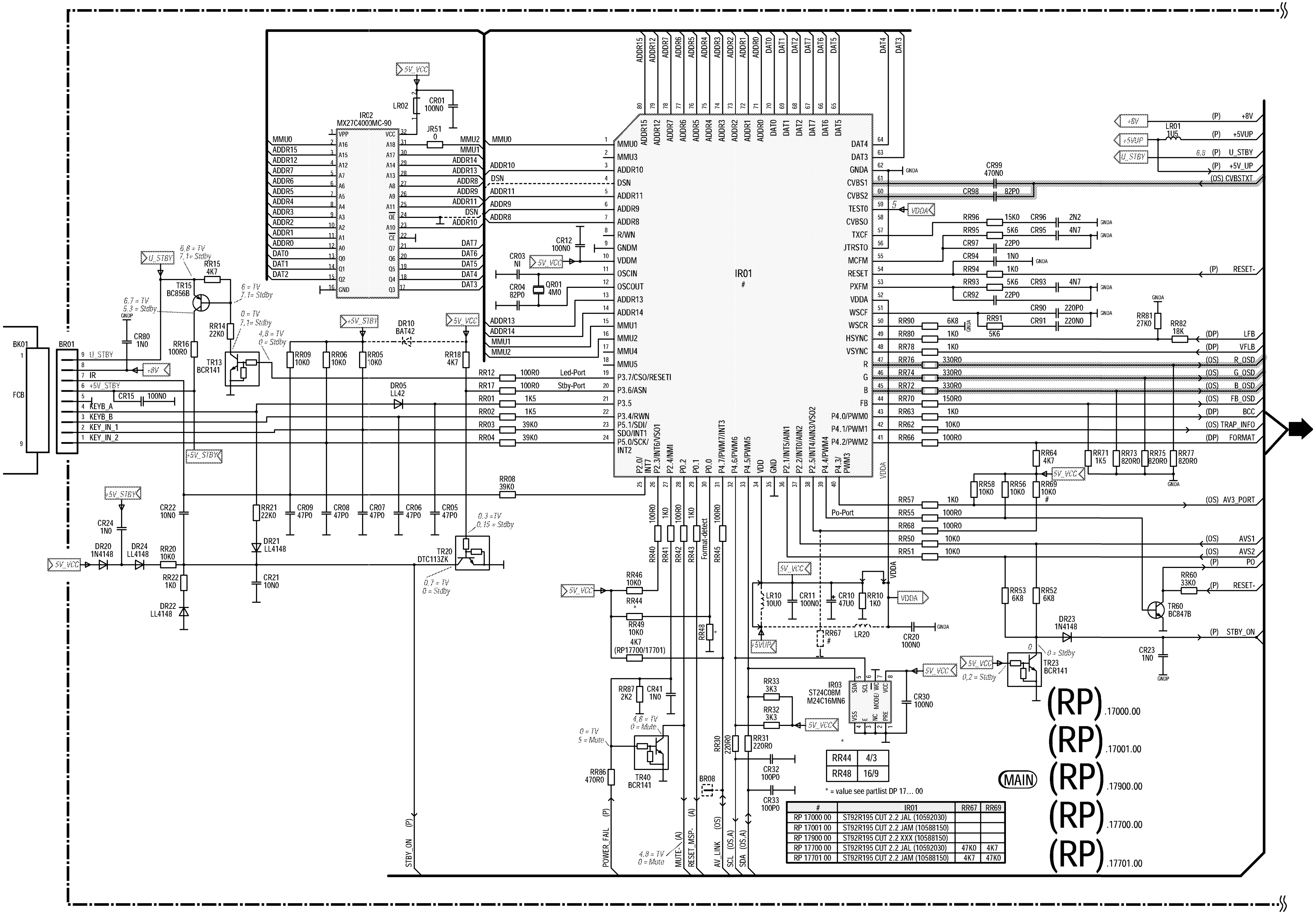
Le remplacement des éléments de sécurité (repérés avec le symbole ⚠) par des composants non homologués selon la Norme CEI 65 entraine la non-conformité de l'appareil.
Dans ce cas, la responsabilité du fabricant n'est plus engagée.

Wenn Sicherheitsteile (mit dem Symbol ⚠ gekennzeichnet) durch nicht normgerechte Teile ersetzt werden, erlischt die Haftung des Herstellers.

La sostituzione degli elementi di sicurezza (contrassegnati con il segno ⚠) con componenti non omologati secondo la norma CEI 65 comporta la non conformitá dell'apparecchio.
In tal caso é "esclusa la responsabilità" del costruttore.

La subtitución de elementos de seguridad (marcados con el simbolo ⚠) por componentes no homologados segun la norma CEI 65, provoca la no conformidad del aparato.
En ese caso, el fabricante cesa de ser responsable.

CONTROL MICROPROCESSOR - MICROPROCESSEUR DE COMMANDE - MIKROPROZESSOR - MICROPROCESSORE DEI COMANDI - MICROPROCESADOR DE LOS MANDOS



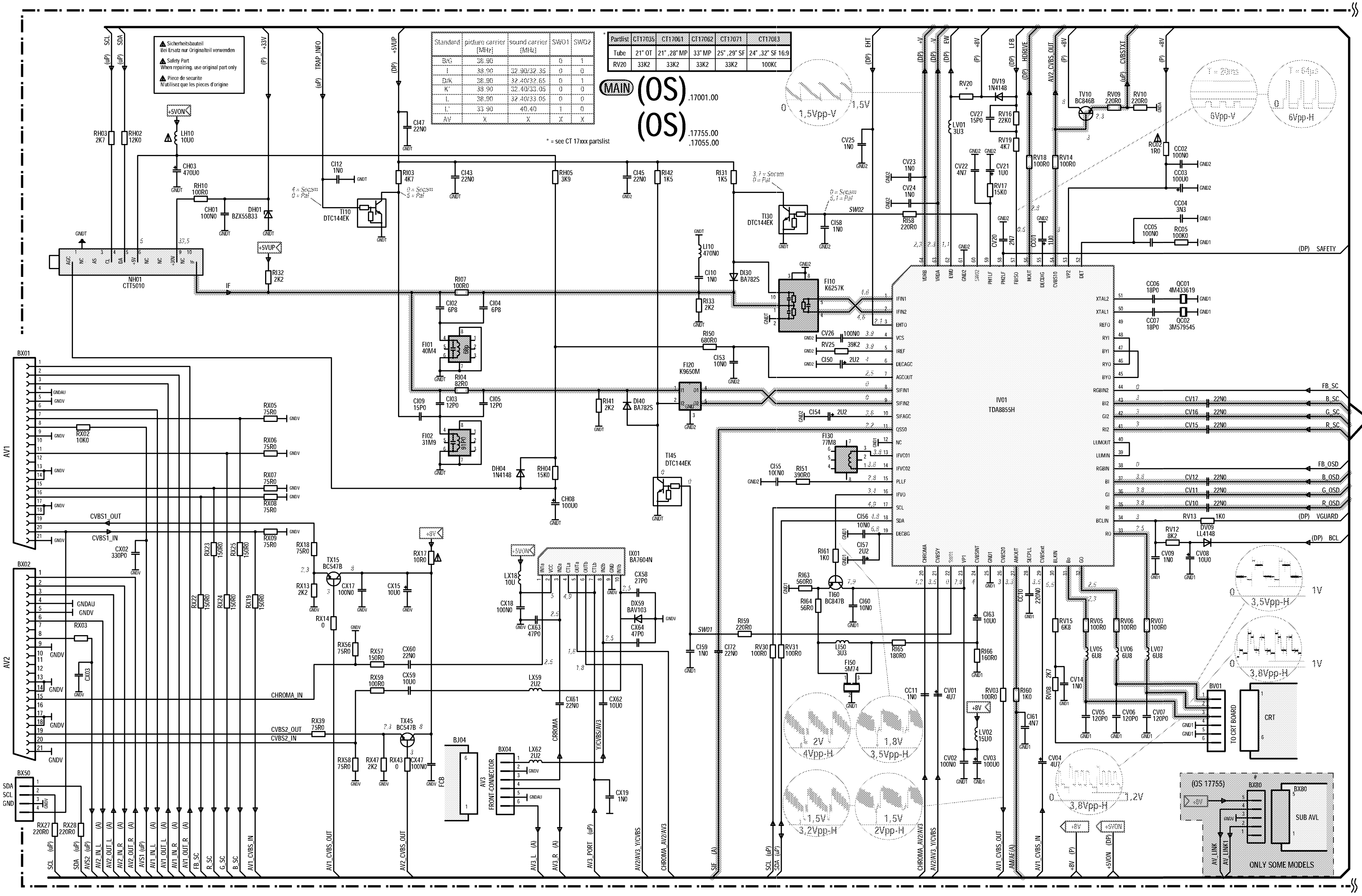
IRC2
MX27C4000MC-90
CR01
100N0
LR02
JR51
0
5V_VCC
IR01
#
MMU0
MMU1
MMU2
MMU4
MMU5
ADDR10
DSN
ADDR11
ADDR9
ADDR8
R/WN
GNDM
VDDM
OSCIN
OSCOUT
ADDR13
ADDR14
P3.7/CSO/RESETI
P3.6/ASN
P3.5
P3.4/RWN
P5.1/SDI/SDO/INT1
P5.0/SCK/INT2
DAT4
DAT3
GNDA
CVBS1
CVBS2
TEST0
CVBSO
TXCF
JTRSTO
MCFM
RESET
PXFM
VDDA
WSCF
WSCR
HSYNC
VSYNC
R
G
B
FB
P4.0/PWM0
P4.1/PWM1
P4.2/PWM2
CR12
100N0
CR03
NI
CR04
82P0
QR01
4M0
Led-Port
Stby-Port
Po-Port
Format-detect
BK01
BR01
FCB
U_STBY
IR
+5V_STBY
KEYB_A
KEYB_B
KEY_IN_1
KEY_IN_2
TR15
BC856B
TR13
BCR141
TR20
DTC113ZK
TR40
BCR141
TR23
BCR141
TR60
BC847B
IR03
ST24C08M
M24C16MN6
LR01
1U5
(P) +8V
(P) +5VUP
(P) U_STBY
(P) +5V_UP
(OS) CVBSTXT
(P) RESET-
(DP) LFB
(DP) VFLB
(OS) R_OSD
(OS) G_OSD
(OS) B_OSD
(OS) FB_OSD
(DP) BCC
(OS) TRAP_INFO
(DP) FORMAT
(OS) AV3_PORT
(OS) AVS1
(OS) AVS2
(P) PO
(P) STBY_ON
STBY_ON (P)
POWER_FAIL (P)
MUTE- (A)
RESET_MSP- (A)
AV_LINK (OS)
SCL (OS,A)
SDA (OS,A)
6,8 = TV
7,1 = Stdby
0 = TV
5 = Mute
4,8 = TV
0 = Mute
0,3 = TV
0,15 = Stdby
0,7 = TV
0 = Stdby
(RP).17000.00
(RP).17001.00
MAIN
(RP).17900.00
(RP).17700.00
(RP).17701.00

RR44	4/3
RR48	16/9

* = value see partlist DP 17… 00

#	IR01	RR67	RR69
RP 17000 00	ST92R195 CUT 2.2 JAL (10592030)		
RP 17001 00	ST92R195 CUT 2.2 JAM (10588150)		
RP 17900 00	ST92R195 CUT 2.2 XXX (10588150)		
RP 17700 00	ST92R195 CUT 2.2 JAL (10592030)	47K0	4K7
RP 17701 00	ST92R195 CUT 2.2 JAM (10588150)	4K7	47K0

RF/FI/ SCART INTERFACE/VIDEO SIGNAL PROCESSING -HF/FI INTERFACE PERITELEVISION/TRAITEMENT LUMINANCE CHROMINANCE - HF/ZF/ SCART INTERFACE/VIDEO SIGNALVERARBEITUNG - RF/FI /PRESA PERITEL/ELABORAZIONE VIDEO - RF/FI /EUROCONECTOR / TRATAMENTO VIDEO



MAIN (OS).17001.00
(OS).17755.00
.17055.00
IV01 TDA8855H
IX01 BA7604N
NH01 CTT5010
FI10 K6257K
FI20 K9650M
FI01 40M4
FI02 31M9
FI30 77M8
FI50 5M74
TI10 DTC144EK
TI30 DTC144EK
TI45 DTC144EK
TX15 BC547B
TX45 BC547B
TI60 BC847B
TV10 BC846B
QC01 4M433619
QC02 3M579545
BX01
BX02
BX50
BX04 FRONT-CONNECTOR
BJ04
BV01 TO CRT BOARD
CRT
AV1
AV2
AV3
FCB
IF
SW01
SW02
CHROMA_IN
CVBS1_OUT
CVBS1_IN
CVBS2_OUT
CVBS2_IN
FB_SC
B_SC
G_SC
R_SC
FB_OSD
B_OSD
G_OSD
R_OSD
(DP) VGUARD
(DP) BCL
(DP) SAFETY
4 = Secam 0 = Pal
0 = Secam 5 = Pal
3,7 = Secam 0 = Pal
0 = Secam 5,1 = Pal
1,5Vpp-V
6Vpp-V
6Vpp-H
3,5Vpp-H
3,8Vpp-H
4Vpp-H
3,5Vpp-H
3,2Vpp-H
2Vpp-H
3,8Vpp-H
T = 20ms
T = 64µs
(OS 17755)
BX80
SUB AVL
ONLY SOME MODELS
AV_LINK
AV_LINK1

⚠ Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden

⚠ Safety Part
When repairing, use original part only

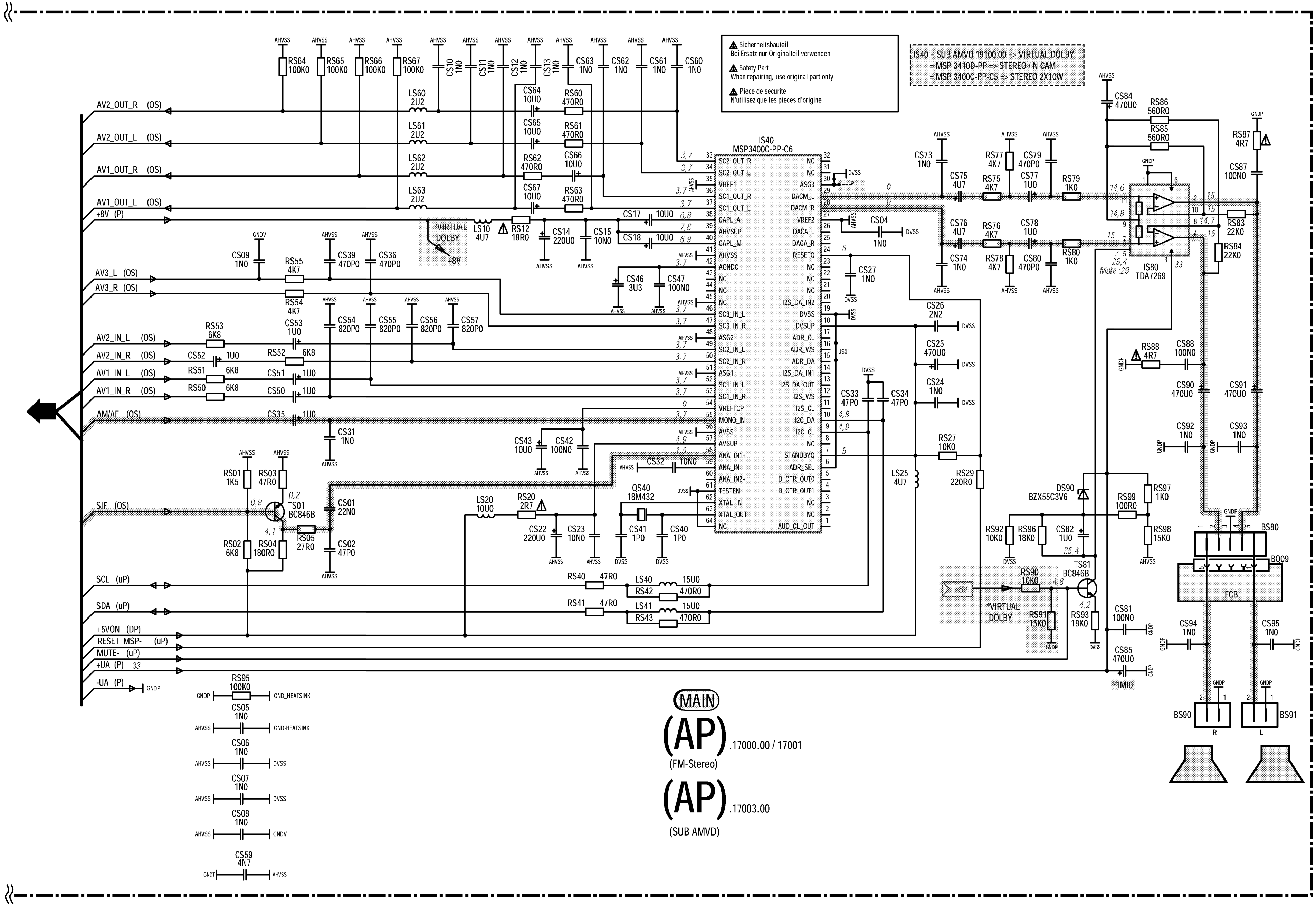
⚠ Piece de securite
N'utilisez que les pieces d'origine

Standard	picture carrier [MHz]	sound carrier [MHz]	SW01	SW02
B/G	38.90		0	1
I	38.90	32.90/32.35	0	0
D/K	38.90	32.40/32.65	0	1
K'	38.90	32.40/33.05	0	0
L	38.90	32.40/33.05	0	0
L'	33.90	40.40	1	0
AV	X	X	X	X

* Partlist	CT17035	CT17061	CT17062	CT17071	CT17083
Tube	21" OT	21" ,28" MP	33" MP	25" ,29" SF	24" ,32" SF 16:9
RV20	33K2	33K2	33K2	33K2	100K0

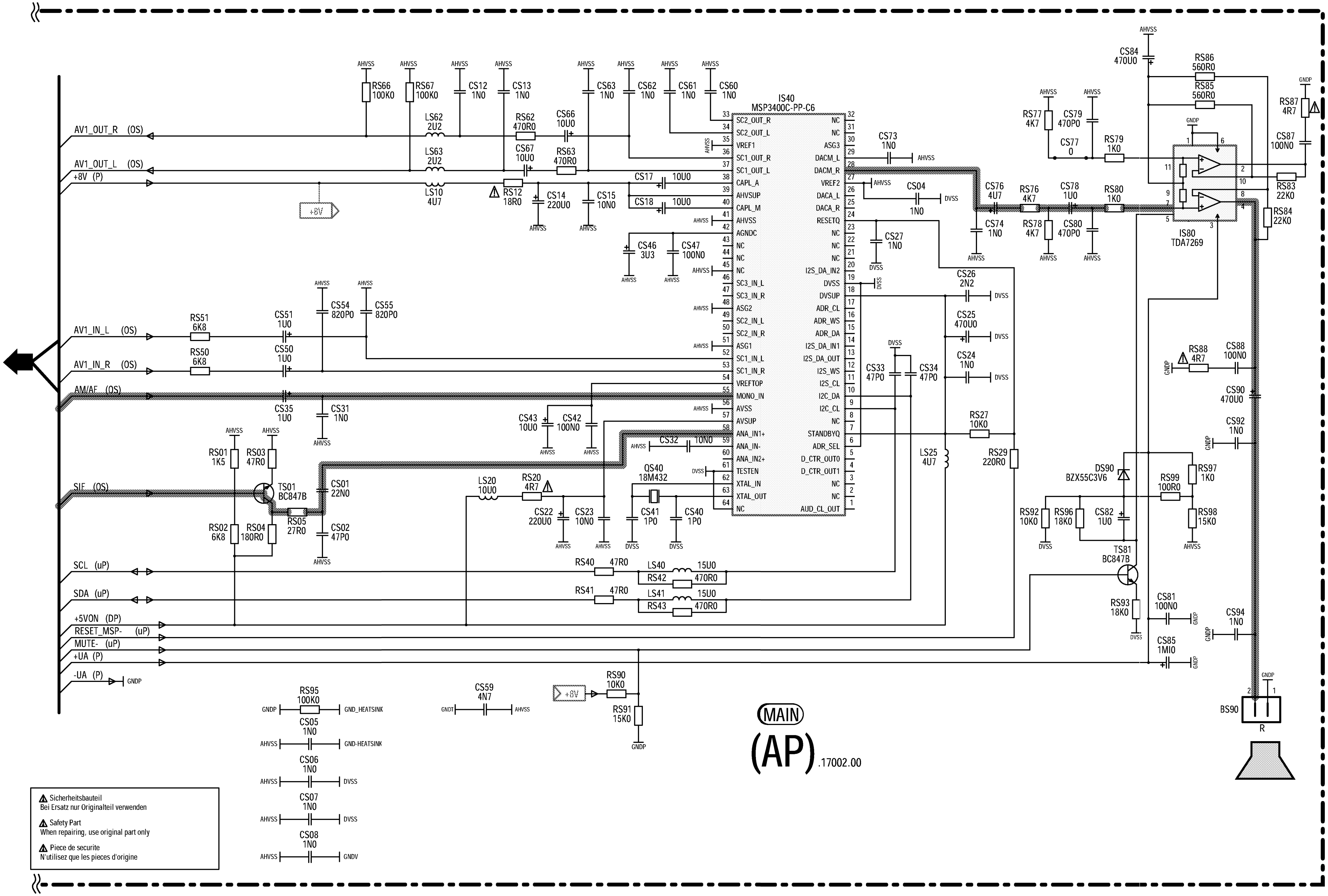
* = see CT 17xxx partslist

AMPLIFIER SCHEMATIC DIAGRAM - SCHEMA DE L'AMPLIFICATEUR - SCHALTBILD AUDIO-SIGNALVERABEITUNG - SCHEMA DELL' AMPLIFICATORE ESQUEMA DEL AMPLIFICADOR (STEREO)



Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden
Safety Part
When repairing, use original part only
Piece de securite
N'utilisez que les pieces d'origine
IS40 = SUB AMVD 19100 00 => VIRTUAL DOLBY
= MSP 3410D-PP => STEREO / NICAM
= MSP 3400C-PP-C5 => STEREO 2X10W
IS40
MSP3400C-PP-C6
IS80
TDA7269
AV2_OUT_R (OS)
AV2_OUT_L (OS)
AV1_OUT_R (OS)
AV1_OUT_L (OS)
+8V (P)
AV3_L (OS)
AV3_R (OS)
AV2_IN_L (OS)
AV2_IN_R (OS)
AV1_IN_L (OS)
AV1_IN_R (OS)
AM/AF (OS)
SIF (OS)
SCL (uP)
SDA (uP)
+5VON (DP)
RESET_MSP- (uP)
MUTE- (uP)
+UA (P)
-UA (P)
RS64 100K0
RS65 100K0
RS66 100K0
RS67 100K0
CS10 1N0
CS11 1N0
CS12 1N0
CS13 1N0
CS63 1N0
CS62 1N0
CS61 1N0
CS60 1N0
LS60 2U2
LS61 2U2
LS62 2U2
LS63 2U2
CS64 10U0
CS65 10U0
CS66 10U0
CS67 10U0
RS60 470R0
RS61 470R0
RS62 470R0
RS63 470R0
°VIRTUAL DOLBY
LS10 4U7
RS12 18R0
CS14 220U0
CS15 10N0
CS17 10U0
CS18 10U0
CS09 1N0
RS55 4K7
RS54 4K7
CS39 470P0
CS36 470P0
CS46 3U3
CS47 100N0
RS53 6K8
CS53 1U0
CS54 820P0
CS55 820P0
CS56 820P0
CS57 820P0
CS52 1U0
RS52 6K8
RS51 6K8
CS51 1U0
RS50 6K8
CS50 1U0
CS35 1U0
CS31 1N0
CS43 10U0
CS42 100N0
CS32 10N0
RS01 1K5
RS03 47R0
TS01 BC846B
CS01 22N0
RS02 6K8
RS04 180R0
RS05 27R0
CS02 47P0
LS20 10U0
RS20 2R7
CS22 220U0
CS23 10N0
QS40 18M432
CS41 1P0
CS40 1P0
RS40 47R0
RS41 47R0
LS40 15U0
RS42 470R0
LS41 15U0
RS43 470R0
CS04 1N0
CS27 1N0
CS26 2N2
CS25 470U0
CS24 1N0
CS33 47P0
CS34 47P0
RS27 10K0
RS29 220R0
LS25 4U7
CS73 1N0
CS75 4U7
RS77 4K7
RS75 4K7
CS79 470P0
CS77 1U0
RS79 1K0
CS76 4U7
RS76 4K7
CS78 1U0
CS74 1N0
RS78 4K7
CS80 470P0
RS80 1K0
CS84 470U0
RS86 560R0
RS85 560R0
RS87 4R7
CS87 100N0
RS83 22K0
RS84 22K0
RS88 4R7
CS88 100N0
CS90 470U0
CS91 470U0
CS92 1N0
CS93 1N0
DS90 BZX55C3V6
RS99 100R0
RS97 1K0
RS92 10K0
RS96 18K0
CS82 1U0
RS98 15K0
BS80
BQ09
FCB
RS90 10K0
TS81 BC846B
+8V
RS91 15K0
RS93 18K0
CS81 100N0
CS85 470U0
°1MI0
CS94 1N0
CS95 1N0
BS90
BS91
R
L
RS95 100K0
GND_HEATSINK
CS05 1N0
GND-HEATSINK
CS06 1N0
CS07 1N0
CS08 1N0
CS59 4N7
AHVSS
DVSS
GNDP
GNDV
GNDT
MAIN
(AP).17000.00 / 17001
(FM-Stereo)
(AP).17003.00
(SUB AMVD)

AMPLIFIER SCHEMATIC DIAGRAM - SCHEMA DE L’AMPLIFICATEUR - SCHALTBILD AUDIO-SIGNALVERABEITUNG - SCHEMA DELL’ AMPLIFICATORE - ESQUEMA DEL AMPLIFICADOR
(MONO)


AV1_OUT_R (OS)
AV1_OUT_L (OS)
+8V (P)
AV1_IN_L (OS)
AV1_IN_R (OS)
AM/AF (OS)
SIF (OS)
SCL (uP)
SDA (uP)
+5VON (DP)
RESET_MSP- (uP)
MUTE- (uP)
+UA (P)
-UA (P)
GNDP
+8V
AHVSS
DVSS
GNDT
GND_HEATSINK
GND-HEATSINK
GNDV
RS66 100K0
RS67 100K0
CS12 1N0
CS13 1N0
CS63 1N0
CS62 1N0
CS61 1N0
CS60 1N0
LS62 2U2
LS63 2U2
LS10 4U7
RS62 470R0
CS66 10U0
CS67 10U0
RS63 470R0
RS12 18R0
CS14 220U0
CS15 10N0
CS17 10U0
CS18 10U0
CS46 3U3
CS47 100N0
IS40
MSP3400C-PP-C6
SC2_OUT_R
SC2_OUT_L
VREF1
SC1_OUT_R
SC1_OUT_L
CAPL_A
AHVSUP
CAPL_M
AHVSS
AGNDC
NC
SC3_IN_L
SC3_IN_R
ASG2
SC2_IN_L
SC2_IN_R
ASG1
SC1_IN_L
SC1_IN_R
VREFTOP
MONO_IN
AVSS
AVSUP
ANA_IN1+
ANA_IN-
ANA_IN2+
TESTEN
XTAL_IN
XTAL_OUT
ASG3
DACM_L
DACM_R
VREF2
DACA_L
DACA_R
RESETQ
I2S_DA_IN2
DVSS
DVSUP
ADR_CL
ADR_WS
ADR_DA
I2S_DA_IN1
I2S_DA_OUT
I2S_WS
I2S_CL
I2C_DA
I2C_CL
STANDBYQ
ADR_SEL
D_CTR_OUT0
D_CTR_OUT1
AUD_CL_OUT
CS73 1N0
CS04 1N0
CS27 1N0
CS26 2N2
CS25 470U0
CS24 1N0
CS33 47P0
CS34 47P0
RS27 10K0
RS29 220R0
LS25 4U7
RS51 6K8
RS50 6K8
CS51 1U0
CS50 1U0
CS54 820P0
CS55 820P0
CS35 1U0
CS31 1N0
CS43 10U0
CS42 100N0
CS32 10N0
QS40 18M432
CS41 1P0
CS40 1P0
LS20 10U0
RS20 4R7
CS22 220U0
CS23 10N0
RS01 1K5
RS03 47R0
TS01 BC847B
RS05 27R0
CS01 22N0
RS02 6K8
RS04 180R0
CS02 47P0
RS40 47R0
LS40 15U0
RS42 470R0
RS41 47R0
LS41 15U0
RS43 470R0
RS90 10K0
RS91 15K0
RS95 100K0
CS05 1N0
CS06 1N0
CS07 1N0
CS08 1N0
CS59 4N7
CS84 470U0
RS86 560R0
RS85 560R0
RS87 4R7
CS87 100N0
RS77 4K7
CS79 470P0
CS77 0
RS79 1K0
CS76 4U7
RS76 4K7
CS78 1U0
RS80 1K0
CS74 1N0
RS78 4K7
CS80 470P0
IS80 TDA7269
RS83 22K0
RS84 22K0
RS88 4R7
CS88 100N0
CS90 470U0
CS92 1N0
DS90 BZX55C3V6
RS99 100R0
RS97 1K0
RS98 15K0
RS92 10K0
RS96 18K0
CS82 1U0
TS81 BC847B
RS93 18K0
CS81 100N0
CS85 1MI0
CS94 1N0
BS90
R
MAIN
(AP)
.17002.00

⚠ Sicherheitsbauteil
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⚠ Safety Part
When repairing, use original part only

⚠ Piece de securite
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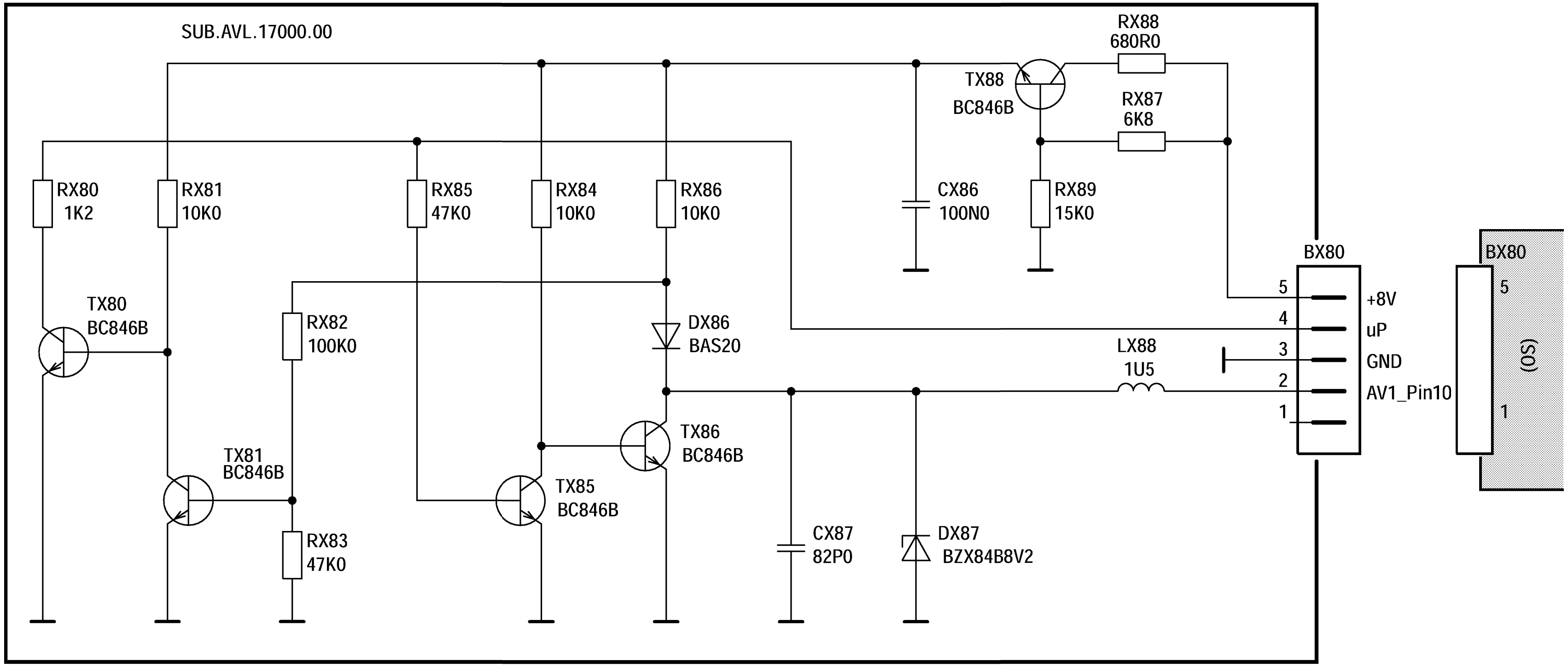
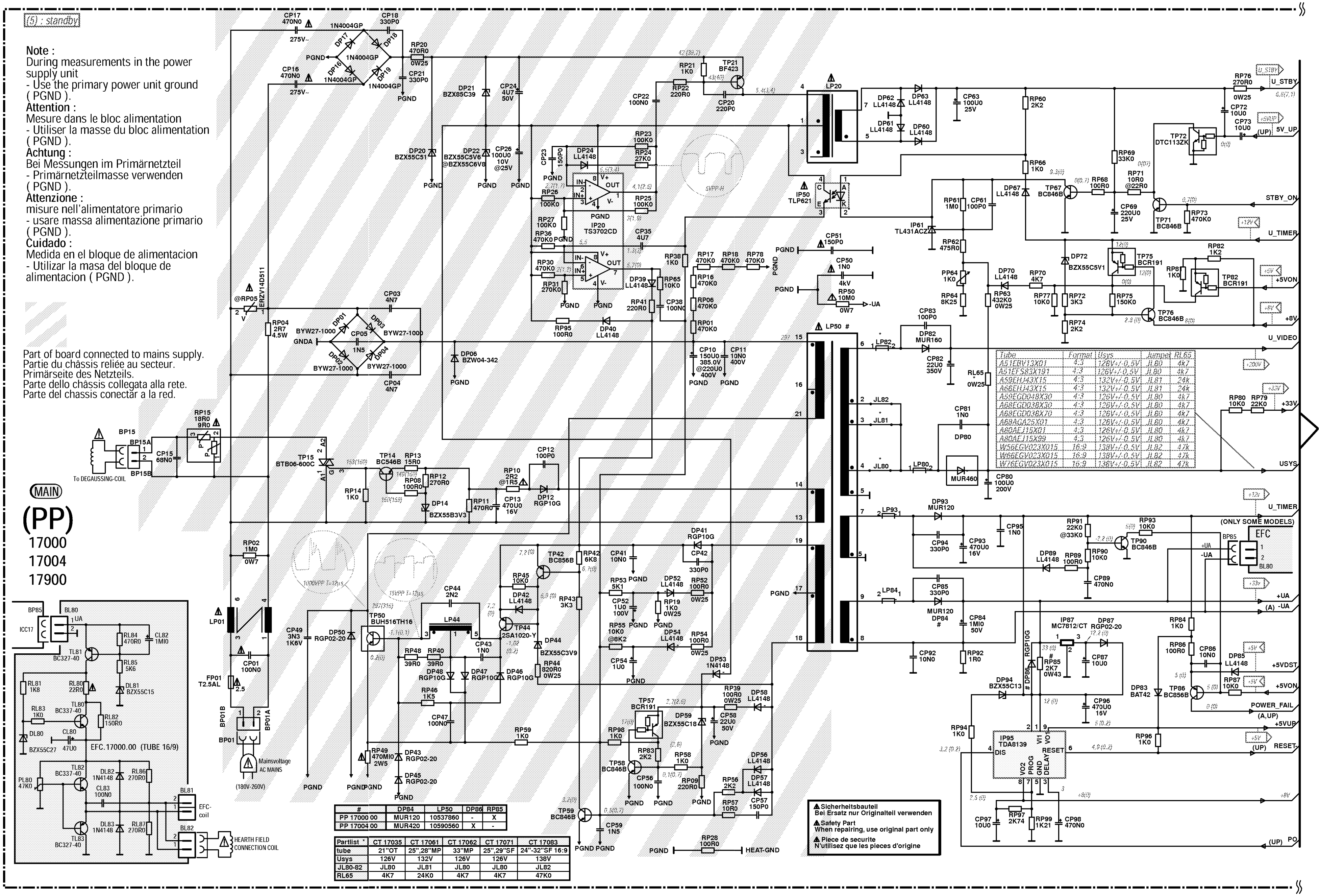
SUB AVL 17000


SUB.AVL.17000.00
RX88
680R0
TX88
BC846B
RX87
6K8
RX80
1K2
RX81
10K0
RX85
47K0
RX84
10K0
RX86
10K0
CX86
100N0
RX89
15K0
BX80
BX80
5
+8V
4
uP
3
GND
2
AV1_Pin10
1
5
1
(OS)
TX80
BC846B
RX82
100K0
DX86
BAS20
LX88
1U5
TX86
BC846B
TX81
BC846B
TX85
BC846B
RX83
47K0
CX87
82P0
DX87
BZX84B8V2

POWER SUPPLY - ALIMENTATION - NETZTEIL - ALIMENTAZIONE - ALIMENTACIÓN


(5) : standby
(MAIN)
(PP)
17000
17004
17900
CP17 470N0 275V~
CP16 470N0 275V~
CP18 330P0
CP21 330P0
DP17 DP18 DP16 DP19 1N4004GP
RP20 470R0 0W25
PGND
DP21 BZX85C39
CP24 4U7 50V
DP20 BZX55C51
DP22 BZX55C5V6 @BZX55C6V8
CP26 100U0 10V @25V
CP23 150P0
DP24 LL4148
RP23 100K0
RP24 27K0
RP25 100K0
RP26 100K0
RP27 100K0
RP36 470K0
IP20 TS3702CD
CP35 4U7
RP30 470K0
RP31 270K0
RP95 100R0
DP40 LL4148
DP39 LL4148
RP65 10K0
RP41 220R0
CP38 100N0
CP22 100N0
RP21 1K0
RP22 220R0
TP21 BF423
CP20 220P0
LP20
IP50 TLP621
CP51 150P0
CP50 1N0 4kV
RP50 10M0 0W7
-UA
RP38 1K0
RP17 470K0
RP18 470K0
RP78 470K0
RP16 470K0
RP06 470K0
RP01 470K0
CP10 150U0 385.0V @220U0 400V
CP11 10N0 400V
@RP05 ERZV14D511
RP04 2R7 4.5W
DP01 DP02 DP03 DP04 BYW27-1000
CP03 4N7
CP04 4N7
CP05 1N5
GNDA
DP06 BZW04-342
RP15 18R0 9R0
BP15 BP15A BP15B
CP15 68N0
To DEGAUSSING-COIL
TP15 BTB06-600C
TP14 BC546B
RP13 15R0
RP12 270R0
RP08 100R0
RP14 1K0
DP14 BZX55B3V3
RP11 470R0
RP10 2R2 @1R5
CP12 100P0
CP13 470U0 16V
DP12 RGP10G
RP02 1M0 0W7
LP01
CP01 100N0
FP01 T2.5AL
BP01 BP01A BP01B
Mainsvoltage AC MAINS
(180V-260V)
TP50 BUH516TH16
CP49 3N3 1K6V
DP50 RGP02-20
LP44
CP44 2N2
TP44 2SA1020-Y
CP43 1N0
RP48 39R0
RP40 39R0
DP48 RGP10G
DP47 RGP10G
DP46 RGP10G
RP46 1K5
CP47 100N0
RP49 470MI0 2W5
DP43 RGP02-20
DP45 RGP02-20
TP42 BC856B
RP42 6K8
RP45 10K0
DP42 LL4148
RP43 3K3
DP44 BZX55C3V9
RP44 820R0 0W25
CP41 10N0
RP53 5K1
CP52 1U0 100V
RP55 10K0 @8K2
CP54 1U0
DP52 LL4148
RP19 1K0 0W25
DP54 LL4148
DP41 RGP10G
CP42 330P0
RP52 100R0 0W25
RP54 100R0 0W25
DP53 1N4148
RP39 100R0 0W25
DP58 LL4148
TP57 BCR191
DP59 BZX55C18
CP58 22U0 50V
RP98 1K0
RP83 2K2
TP58 BC846B
CP56 100N0
RP58 1K0
RP09 220R0
RP59 1K0
RP56 2K2
DP56 LL4148
DP57 LL4148
RP57 10R0
CP57 150P0
TP59 BC846B
CP59 1N5
RP28 100R0
HEAT-GND
LP50 #
DP62 LL4148
DP63 LL4148
DP61 LL4148
DP60 LL4148
CP63 100U0 25V
RP60 2K2
RP66 1K0
DP67 LL4148
TP67 BC846B
RP68 100R0
RP69 33K0
RP71 10R0 @22R0
CP69 220U0 25V
TP71 BC846B
RP73 470K0
TP72 DTC113ZK
RP76 270R0 0W25
CP72 10U0
CP73 10U0
U_STBY
5V_UP
(UP)
STBY_ON
U_TIMER
RP61 1M0
CP61 100P0
IP61 TL431ACZ
RP62 475R0
PP64 1K0
RP64 8K25
RP63 432K0 0W25
DP70 LL4148
RP70 4K7
DP72 BZX55C5V1
RP77 10K0
RP72 3K3
RP74 2K2
RP75 150K0
TP75 BCR191
TP76 BC846B
RP81 1K0
RP82 1K2
TP82 BCR191
+5VON
+8V
U_VIDEO
CP83 100P0
DP82 MUR160
LP82
CP82 22U0 350V
RL65 * 0W25
JL82 JL81 JL80
CP81 1N0
DP80
LP80
MUR460
CP80 100U0 200V
RP80 10K0
RP79 22K0
+33V
USYS
LP93
DP93 MUR120
CP95 1N0
CP94 330P0
CP93 470U0 16V
RP91 22K0 @33K0
RP93 10K0
TP90 BC846B
DP89 LL4148
RP89 100R0
RP90 10K0
CP89 470N0
(ONLY SOME MODELS)
EFC
BP85
BL80
+UA
-UA
(A)
LP84
CP85 330P0
MUR120 DP84 #
CP84 1MI0 50V
CP92 10N0
RP92 1R0
IP87 MC7812/CT
DP87 RGP02-20
RGP10G
# DP86
# RP85 2K7 0W43
CP87 10U0
DP94 BZX55C13
CP96 470U0 16V
DP83 BAT42
TP86 BC856B
RP84 1K0
RP86 100R0
CP86 10N0
DP85 LL4148
RP87 10K0
+5VDST
+5VON
POWER_FAIL
(A,UP)
+5VUP
RP94 1K0
IP95 TDA8139
DIS RESET VI1 VO1 VO2 PROG GND DELAY
RP96 1K0
RESET
CP97 10U0
RP97 2K74
RP99 1K21
CP98 470N0
PO
BP85 BL80 UA
ICC17
TL81 BC327-40
RL84 470R0
CL82 1MI0
RL85 5K6
DL81 BZX55C15
RL81 1K8
RL80 22R0
TL80 BC337-40
RL83 1K0
RL82 150R0
DL80 BZX55C27
CL80 47U0
EFC.17000.00 (TUBE 16/9)
TL82 BC337-40
PL80 47K0
DL82 1N4148
RL86 270R0
CL83 100N0
BL81
EFC-coil
TL83 BC327-40
DL83 1N4148
RL87 270R0
BL82
HEARTH FIELD CONNECTION COIL

Note :
During measurements in the power supply unit
- Use the primary power unit ground (PGND).

Attention :
Mesure dans le bloc alimentation
- Utiliser la masse du bloc alimentation (PGND).

Achtung :
Bei Messungen im Primärnetzteil
- Primärnetzteilmasse verwenden (PGND).

Attenzione :
misure nell'alimentatore primario
- usare massa alimentazione primario (PGND).

Cuidado :
Medida en el bloque de alimentacion
- Utilizar la masa del bloque de alimentacion (PGND).

Part of board connected to mains supply.
Partie du châssis reliée au secteur.
Primärseite des Netzteils.
Parte dello châssis collegata alla rete.
Parte del chassis conectar a la red.

Tube	Format	Usys	Jumper	RL65
A51EBV13X01	4:3	128V+/-0,5V	JL80	4k7
A51EFS83X191	4:3	126V+/-0,5V	JL80	4k7
A59EHJ43X15	4:3	132V+/-0,5V	JL81	24k
A66EHJ43X15	4:3	132V+/-0,5V	JL81	24k
A59EGD048X30	4:3	126V+/-0,5V	JL80	4k7
A68EGD038X30	4:3	126V+/-0,5V	JL80	4k7
A68EGD038X70	4:3	126V+/-0,5V	JL80	4k7
A68AGA25X01	4:3	126V+/-0,5V	JL80	4k7
A80AEJ15X01	4:3	126V+/-0,5V	JL80	4k7
A80AEJ15X99	4:3	126V+/-0,5V	JL80	4k7
W56EGV023X015	16:9	138V+/-0,5V	JL82	47k
W66EGV023X015	16:9	138V+/-0,5V	JL82	47k
W76EGV023X015	16:9	138V+/-0,5V	JL82	47k

#	DP84	LP50	DP86	RP85
PP 17000 00	MUR120	10537860	-	X
PP 17004 00	MUR420	10590560	X	-

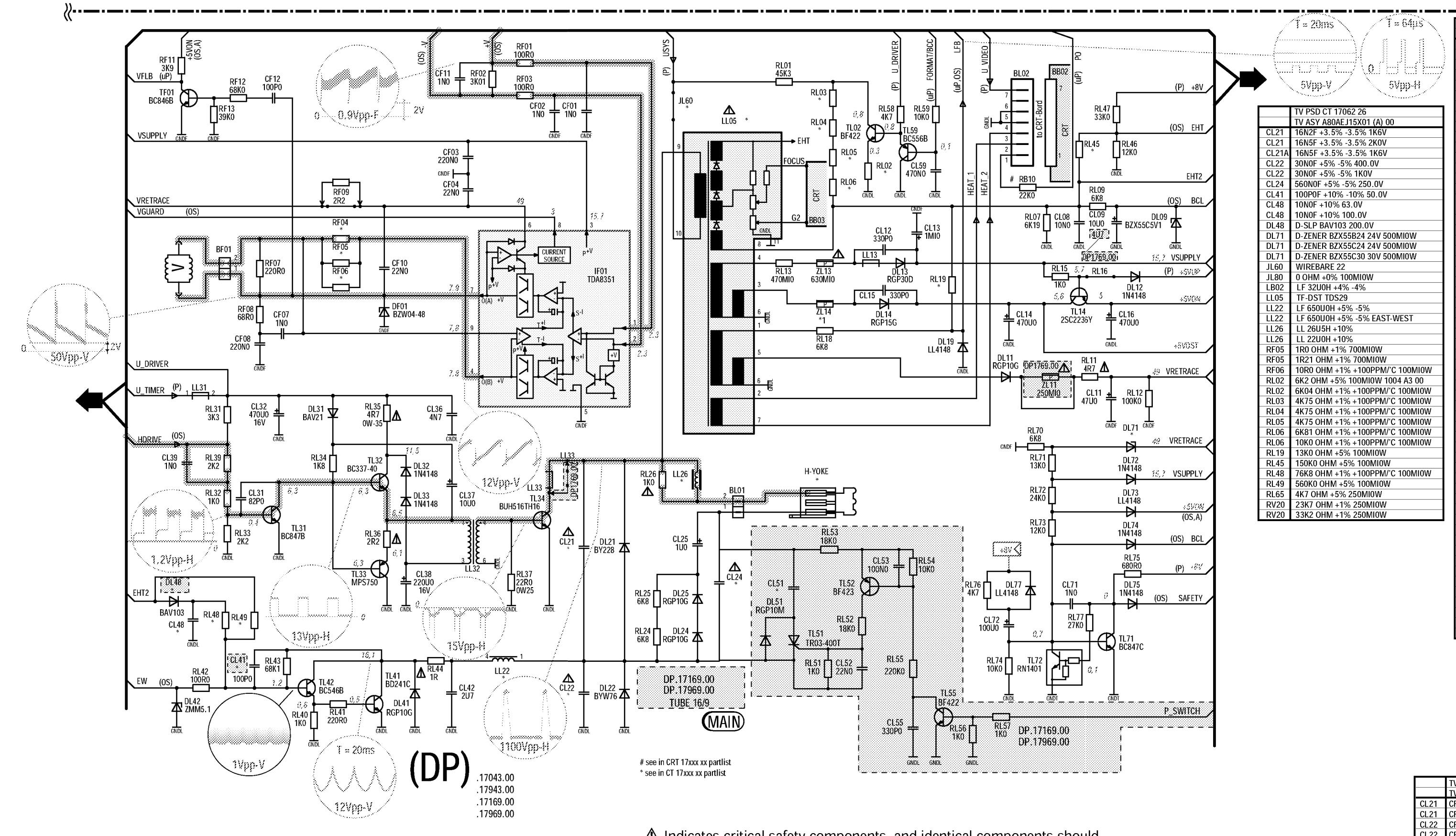
Partlist *	CT 17035	CT 17061	CT 17062	CT 17071	CT 17083
tube	21"OT	25",28"MP	33"MP	25",29"SF	24"-32"SF 16:9
Usys	126V	132V	126V	126V	138V
JL80-82	JL80	JL81	JL80	JL80	JL82
RL65	4K7	24K0	4K7	4K7	47K0

⚠ Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden

⚠ Safety Part
When repairing, use original part only

⚠ Piece de securite
N'utilisez que les pieces d'origine

SCANNING - BALAYAGE - ABLENKUNG - BARRIDO - SCANSIONE



⚠ Indicates critical safety components, and identical components should be used for replacement. Only then can the operational safety be garanteed.

Le remplacement des éléments de sécurité (repérés avec le symbole ⚠) par des composants non homologués selon la Norme CEI 65 entraine la non-conformité de l'appareil.
Dans ce cas, la responsabilité du fabricant n'est plus engagée.

Wenn Sicherheitsteile (mit dem Symbol ⚠ gekennzeichnet) durch nicht normgerechte Teile ersetzt werden, erlischt die Haftung des Herstellers.

La sostituzione degli elementi di sicurezza (contrassegnati con il segno ⚠) con componenti non omologati secondo la norma CEI 65 comporta la non conformitá dell'apparecchio.
In tal caso é "esclusa la responsabilità" del costruttore.

La subtitución de elementos de seguridad (marcados con el simbolo ⚠) por componentes no homologados segun la norma CEI 65, provoca la no conformidad del aparato.
En ese caso, el fabricante cesa de ser responsable.

	TV PSD CT 17062 26
	TV ASY A80AEJ15X01 (A) 00
CL21	16N2F +3.5% -3.5% 1K6V
CL21	16N5F +3.5% -3.5% 2K0V
CL21A	16N5F +3.5% -3.5% 1K6V
CL22	30N0F +5% -5% 400.0V
CL22	30N0F +5% -5% 1K0V
CL24	560N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	10N0F +10% 63.0V
CL48	10N0F +10% 100.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55B24 24V 500MI0W
DL71	D-ZENER BZX55C24 24V 500MI0W
DL71	D-ZENER BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0% 100MI0W
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29
LL22	LF 650U0H +5% -5%
LL22	LF 650U0H +5% -5% EAST-WEST
LL26	LL 26U5H +10%
LL26	LL 22U0H +10%
RF05	1R0 OHM +1% 700MI0W
RF05	1R21 OHM +1% 700MI0W
RF06	10R0 OHM +1% +100PPM/'C 100MI0W
RL02	6K2 OHM +5% 100MI0W 1004 A3 00
RL02	6K04 OHM +1% +100PPM/'C 100MI0W
RL03	4K75 OHM +1% +100PPM/'C 100MI0W
RL04	4K75 OHM +1% +100PPM/'C 100MI0W
RL05	4K75 OHM +1% +100PPM/'C 100MI0W
RL06	6K81 OHM +1% +100PPM/'C 100MI0W
RL06	10K0 OHM +1% +100PPM/'C 100MI0W
RL19	13K0 OHM +5% 100MI0W
RL45	150K0 OHM +5% 100MI0W
RL48	76K8 OHM +1% +100PPM/'C 100MI0W
RL49	560K0 OHM +5% 100MI0W
RL65	4K7 OHM +5% 250MI0W
RV20	23K7 OHM +1% 250MI0W
RV20	33K2 OHM +1% 250MI0W

	TV PSD CT 17035 26
	TV ASY A51EFS83X191 03
CL21	8N3F +3.5% -3.5% 2K0V
CL21	8N3F +3.5% -3.5% 1K6V
CL21	8N8F +3.5% -3.5% 1K6V
CL21A	8N3F +3.5% -3.5% 1K6V
CL22	33N0F +5% -5% 400.0V
CL22	30N0F +5% -5% 400.0V
CL22	33N0F +5% -5% 1K0V
CL24	440N0F +5% -5% 400.0V
CL24	440N0F +5% -5% 250.0V
CL24	440N0F +5% -5% 250.0V
CL24A	440N0F +5% -5% 250.0V
CL41	1N0F +10% -10% 50.0V
CL48	100N0F +5% 63.0V
DL71	D-ZENER BZX55C20 20V 500MI0W
DL71	D-ZENER BZX55C24 24V 500MI0W
DL71	D-ZENER BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0%
JP81	0 OHM +0%
LB02	LF 18U0H +7% -7%
LB02	LF 21U0H +5% -5%
LL05	F-DST M30FBC3 10555640 3087
LL22	LF 650U0H +5% -5%
LL22	LF 650U0H +5% -5% EAST-WEST
LL26	LL 85U0H 2519 A0
LL26	LL 39U0H +10%
RF04	1R21 OHM +1% 700MI0W
RF05	1R21 OHM +1% 700MI0W
RF05	1R5 OHM +1% 700MI0W
RF06	10R0 OHM +1% +100PPM/'C
RL02	6K2 OHM +5%
RL02	6K04 OHM +1% +100PPM/'C
RL03	10K0 OHM +1% +100PPM/'C
RL04	10K0 OHM +1% +100PPM/'C
RL04	20K0 OHM +1% +100PPM/'C
RL05	10K0 OHM +1% +100PPM/'C
RL0	20K0 OHM +1% +100PPM/'C
RL06	10K0 OHM +1% +100PPM/'C
RL06	3K32 OHM +1% +100PPM/'C
RL11	4R7 OHM +10% 250MI0W
RL11	4R7 OHM +5% 250MI0W
RL19	18K0 OHM +5%
RL43	68K1 OHM +1% 250MI0W
RL43	68K1 OHM +1% +100PPM/'C
RL45	82K0 OHM +5%
RL45	110K0 OHM +5%
RL45	470K0 OHM +5%
RL46	12K0 OHM +5%
RL47	33K0 OHM +5%
RL48	100K0 OHM +1% +100PPM/'C
RL49	76K8 OHM +1% +100PPM/'C
RL49	60K4 OHM +1% +100PPM/'C
RL64	8K25 OHM +1% +100PPM/'C
RL65	4K7 OHM +5% 250MI0W
RV20	3K7 OHM +1% 250MI0W
RV20	33K2 OHM +1% 250MI0W
RV20	33K2 OHM +1% +100PPM/'C
ZL13	MP63 630MI0 A 65.0V

	TV ASY A59EHJ43X15 00
	TV ASY A66EHJ43X15 00
	TV PSD CT 17061 32
CL21	14N4F +3.5% -3.5% 1K6V
CL21	14N4F +3.5% -3.5% 1K6V
CL21	14N0F +3.5% -3.5% 1K5V
CL22	30N0F +5% -5% 400.0V
CL22	30N0F +5% -5% 400.0V
CL22	30N0F +5% -5% 1K0V
CL24	440N0F +5% -5% 400.0V
CL24	470N0F +5% -5% 250.0V
CL24	440N0F +5% -5% 250.0V
CL24	440N0F +5% -5% 250.0V
CL24A	440N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	10N0F +10% 63.0V
CL48	10N0F +10% 100.0V
DL48	BAV103 200.0V
DL71	BZX55B24 24V 500MI0W
DL71	BZX55C24 24V 500MI0W
DL71	BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL81	0 OHM +0% 100MI0W
JP80	0 OHM +0% 100MI0W
LB02	13U5H +5% -5%
LB02	18U0H +7% -7%
LB02	21U0H +5% -5%
LB02	21U0H +5% -5%
LL05	TF-DST M30FBC3 10546610 3087
LL05	TF-DST M30FBC3 10600190 3087
LL05	TF-DST M30FBC3 10608680 3087
LL22	650U0H +5% -5%
LL22	650U0H +5% -5% EAST-WEST
LL26	26U5H +10%
LL26	30U5H 2519 A0
RF04	1R21 OHM +1% 700MI0W
RF05	1R0 OHM +1% 700MI0W
RF05	1R21 OHM +1% 700MI0W
RF06	12R1 OHM +1% +100PPM/'C 100MI0W
RL02	10K0 OHM +5% 100MI0W
RL02	6K04 OHM +1% +100PPM/'C 100MI0W
RL02	499R0 OHM +1% +100PPM/'C 100MI0W
RL03	10K0 OHM +1% +100PPM/'C 100MI0W
RL03	11K5 OHM +1% +100PPM/'C 100MI0W
RL04	10K0 OHM +1% +100PPM/'C 100MI0W
RL04	20K0 OHM +1% +100PPM/'C 100MI0W
RL04	11K5 OHM +1% +100PPM/'C 100MI0W
RL05	10K0 OHM +1% +100PPM/'C 100MI0W
RL05	20K0 OHM +1% +100PPM/'C 100MI0W
RL05	11K5 OHM +1% +100PPM/'C 100MI0W
RL06	8K25 OHM +1% +100PPM/'C 100MI0W
RL06	4K75 OHM +1% +100PPM/'C 100MI0W
RL06	9K09 OHM +1% +100PPM/'C 100MI0W
RL06	11K5 OHM +1% +100PPM/'C 100MI0W
RL11	4R7 OHM +10% 250MI0W
RL11	4R7 OHM +5% 250MI0W
RL19	22K0 OHM +5% 100MI0W
RL19	33K0 OHM +5% 100MI0W
RL43	68K1 OHM +1% 250MI0W
RL43	68K1 OHM +1% 250MI0W
RL43	68K1 OHM +1% +100PPM/'C 100MI0W
RL45	180K0 OHM +5% 100MI0W
RL45	270K0 OHM +5% 100MI0W
RL46	12K0 OHM +5% 100MI0W
RL47	33K0 OHM +5% 100MI0W
RL48	76K8 OHM +1% +100PPM/'C 100MI0W
RL48	60K4 OHM +1% +100PPM/'C 100MI0W
RL64	8K25 OHM +1% +100PPM/'C 100MI0W
RL65	24K0 OHM +5% 250MI0W
RV20	33K2 OHM +1% 250MI0W
RV20	33K2 OHM +1% +100PPM/'C 100MI0W
ZL13	MP63 630MI0 A 65.0V

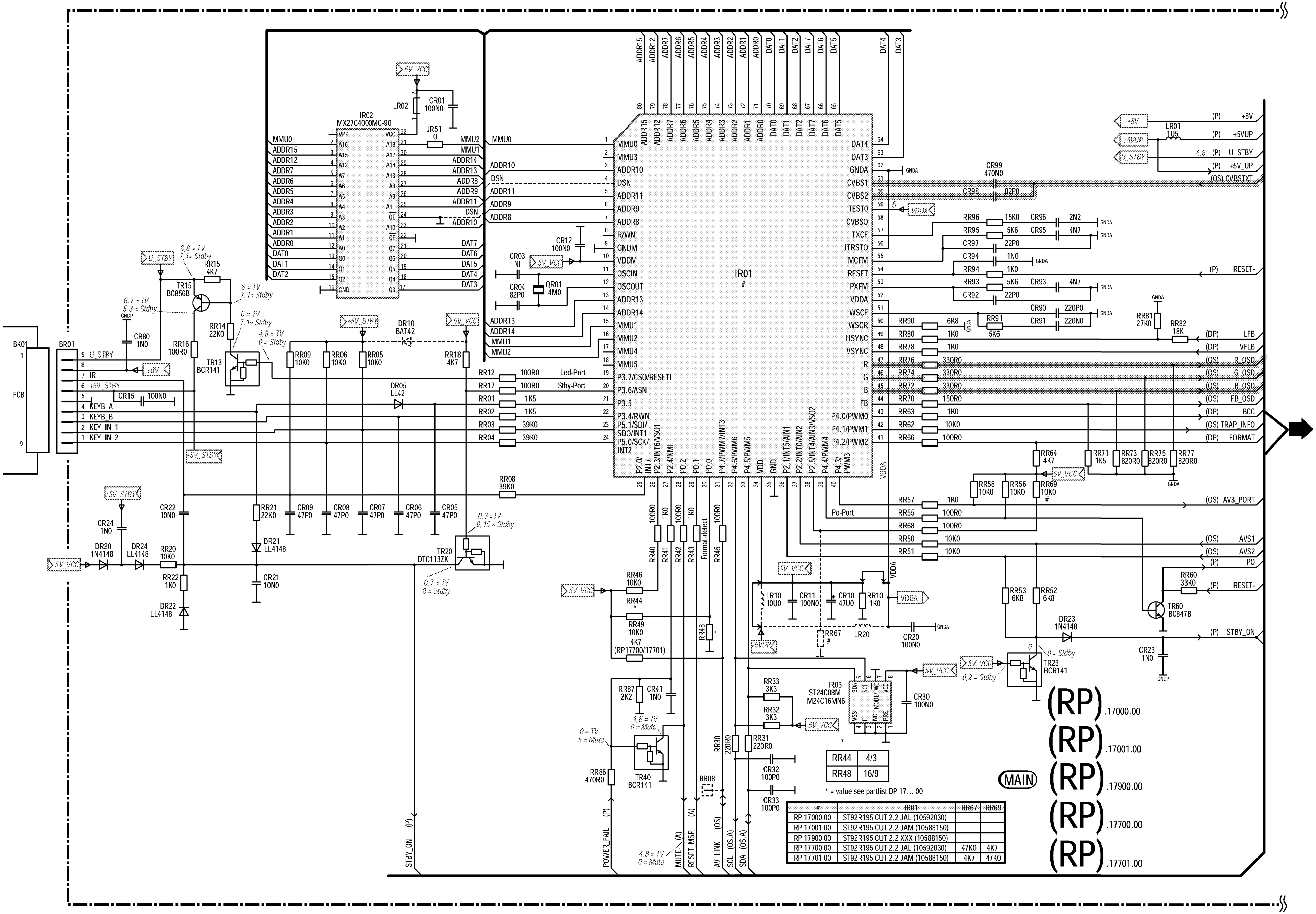
	TV PSD CT 17083 38
	TV ASY W56EGV023X015 56 01
	TV ASY W56EGV023X015 56 01
	TV ASY W66EGV023X015 66 00
	TV ASY W66EGV023X015 66 00
	TV ASY W66EGV023X015 66 01
	TV ASY W76EGV023X015 (A) 00
	TV ASY W76EGV023X015 (A) 00
CL2	14N4F +3.5% -3.5% 1K6V
CL21	15N5F +3.5% -3.5% 1K6V
CL21	15N0F +3.5% -3.5% 2K0V
CL21A	15N0F +3.5% -3.5% 1K6V
CL22	27N0F +5% -5% 400.0V
CL22	27N0F +5% -5% 1K0V
CL24	440N0F +5% -5% 250.0V
CL24	440N0F +5% -5% 400.0V
CL24	440N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	100N0F +5% 63.0V
CL51	90N0F +5% -5% 250.0V
CL51	290N0F +5% -5% 400.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55C20 20V 500MI0W
DL71	D-ZENER BZX55C24 24V 500MI0W
JL60	WIREBARE 22
JL82	0 OHM +0%
JP80	0 OHM +0%
JP81	0 OHM +0%
LB02	LF 29U0H +4% -4%
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29
LL22	LF 650U0H +5% -5%
LL22	LF 650U0H +5% -5% EAST-WEST
LL26	LL 26U5H +10%
LL26	LL 30U5H 2519 A0
RF04	1R21 OHM +1% 700MI0W
RF05	1R21 OHM +1% 700MI0W
RF05	1R5 OHM +1% 700MI0W
RF06	10R0 OHM +1% +100PPM/'C
RL02	4K99 OHM +1% +100PPM/'C
RL02	4K75 OHM +1% +100PPM/'C
RL02	6K04 OHM +1% +100PPM/'C
RL03	6K49 OHM +1% +100PPM/'C
RL03	8K87 OHM +1% +100PPM/'C
RL04	6K49 OHM +1% +100PPM/'C
RL04	8K87 OHM +1% +100PPM/'C
RL04	10K0 OHM +1% +100PPM/'C
RL05	6K49 OHM +1% +100PPM/'C
RL05	8K87 OHM +1% +100PPM/'C
RL05	10K0 OHM +1% +100PPM/'C
RL06	6K49 OHM +1% +100PPM/'C
RL06	8K87 OHM +1% +100PPM/'C
RL06	3K32 OHM +1% +100PPM/'C
RL06	2K37 OHM +1% +100PPM/'C
RL11	4R7 OHM +10% 250MI0W
RL11	4R7 OHM +5% 250MI0W
RL19	15K0 OHM +5%
RL19	13K0 OHM +5%
RL43	68K1 OHM +1% 250MI0W
RL43	68K1 OHM +1% +100PPM/'C
RL45	470K0 OHM +5%
RL45	390K0 OHM +5%
RL46	12K0 OHM +5%
RL47	33K0 OHM +5%
RL48	1K0 OHM +5%
RL48	220K0 OHM +5%
RL48	237K0 OHM +1% +100PPM/'C
RL49	180K0 OHM +5%
RL49	143K0 OHM +1% +100PPM/'C
RL64	8K25 OHM +1% +100PPM/'C
RL65	47K0 OHM +5% 250MI0W
RV20	100K0 OHM +1% 250MI0W
RV20	33K2 OHM +1% +100PPM/'C
RV20	100K0 OHM +1% 250MI0W
ZL13	MP63 630MI0 A 65.0V

	TV ASY A66EHJ43X85 01
	TV PSD CT 17961 32
CL21	CFS 14N4F +3.5% -3.5% 1K6V
CL21	CFS 14N4F +3.5% -3.5% 1K6V
CL22	CFS 30N0F +5% -5% 400.0V
CL22	CFS 30N0F +5% -5% 1K0V
CL24	CFS 440N0F +5% -5% 400.0V
CL24	CFS 440N0F +5% -5% 250.0V
CL24A	CFS 440N0F +5% -5% 250.0V
CL41	CCCMIN 100P0F +10% -10% 50.0V
CL48	CPM 10N0F +10% 100.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55B24 24V 500MI0W
DL71	D-ZENER BZX55C24 24V 500MI0W
JL60	WIREBARE 22
JL81	RCFCCMIN 0 OHM +0% 100MI0W
LB02	LF 21U0H +5% -5%
LL05	TF-DST M30FBC3 10600190 3087
LL05	TF-DST M30FBC3 10608680 3087
LL22	LF 650U0H +5% -5%
LL22	LF 650U0H +5% -5% EAST-WEST
LL26	LL 26U5H +10%
RF05	RMF 1R0 OHM +1% 700MI0W
RL02	RCFCCMIN 10K0 OHM +5% 100MI0W
RL03	RMFCCMIN 10K0 OHM +1% +100PPM/'C 100MI0W
RL04	RMFCCMIN 10K0 OHM +1% +100PPM/'C 100MI0W
RL05	RMFCCMIN 10K0 OHM +1% +100PPM/'C 100MI0W
RL06	RMFCCMIN 8K25 OHM +1% +100PPM/'C 100MI0W
RL06	RMFCCMIN 4K75 OHM +1% +100PPM/'C 100MI0W
RL06	RMFCCMIN 9K09 OHM +1% +100PPM/'C 100MI0W
RL19	RCFCCMIN 22K0 OHM +5% 100MI0W
RL45	RCFCCMIN 180K0 OHM +5% 100MI0W
RL48	RMFCCMIN 76K8 OHM +1% +100PPM/'C 100MI0W
RL65	RCF 24K0 OHM +5% 250MI0W
RV20	RMF 33K2 OHM +1% 250MI0W

	TV ASY A68EGD038X70 (A) 68 00
	TV PSD CT 17971 26
CL21	16N2F +3.5% -3.5% 1K6V
CL21	16N2F +3.5% -3.5% 2K0V
CL21A	16N2F +3.5% -3.5% 1K6V
CL22	30N0F +5% -5% 400.0V
CL22	30N0F +5% -5% 1K0V
CL24	510N0F +5% -5% 250.0V
CL24	510N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	10N0F +10% 100.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55B24 24V 500MI0W
DL71	D-ZENER BZX55C24 24V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0% 100MI0W
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29
LL22	LF 650U0H +5% -5%
LL22	LF 650U0H +5% -5% EAST-WEST
LL26	LL 26U5H +10%
LL26	LL 22U0H +10%
RF05	1R0 OHM +1% 700MI0W
RL02	6K8 OHM +5% 100MI0W 1004 A3 00
RL03	4K75 OHM +1% +100PPM/'C 100MI0W
RL04	4K75 OHM +1% +100PPM/'C 100MI0W
RL05	4K75 OHM +1% +100PPM/'C 100MI0W
RL06	4K75 OHM +1% +100PPM/'C 100MI0W
RL19	15K0 OHM +5% 100MI0W
RL45	180K0 OHM +5% 100MI0W
RL48	100K0 OHM +5% 100MI0W
RL49	300K0 OHM +5% 100MI0W
RL65	4K7 OHM +5% 250MI0W
RV20	33K2 OHM +1% 250MI0W

	TV PSD CT 17962 26
	TV ASY A80AEJ15X99 80 00
CL21	16N5F +3.5% -3.5% 2K0V
CL21A	16N5F +3.5% -3.5% 1K6V
CL22	30N0F +5% -5% 1K0V
CL24	560N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	10N0F +10% 100.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55B24 24V 500MI0W
DL71	D-ZENER BZX55C24 24V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0%
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29
LL22	LF 650U0H +5% -5%
LL22	LF 650U0H +5% -5% EAST-WEST
LL26	LL 22U0H +10%
RF05	1R0 OHM +1% 700MI0W
RL02	6K2 OHM +5%
RL03	4K75 OHM +1% +100PPM/'C
RL04	4K75 OHM +1% +100PPM/'C
RL05	4K75 OHM +1% +100PPM/'C
RL06	10K0 OHM +1% +100PPM/'C
RL19	13K0 OHM +5%
RL45	150K0 OHM +5%
RL48	76K8 OHM +1% +100PPM/'C
RL49	560K0 OHM +5%
RL65	4K7 OHM +5% 250MI0W
RV20	33K2 OHM +1% 250MI0W

CONTROL MICROPROCESSOR - MICROPROCESSEUR DE COMMANDE - MIKROPROZESSOR - MICROPROCESSORE DEI COMANDI - MICROPROCESADOR DE LOS MANDOS

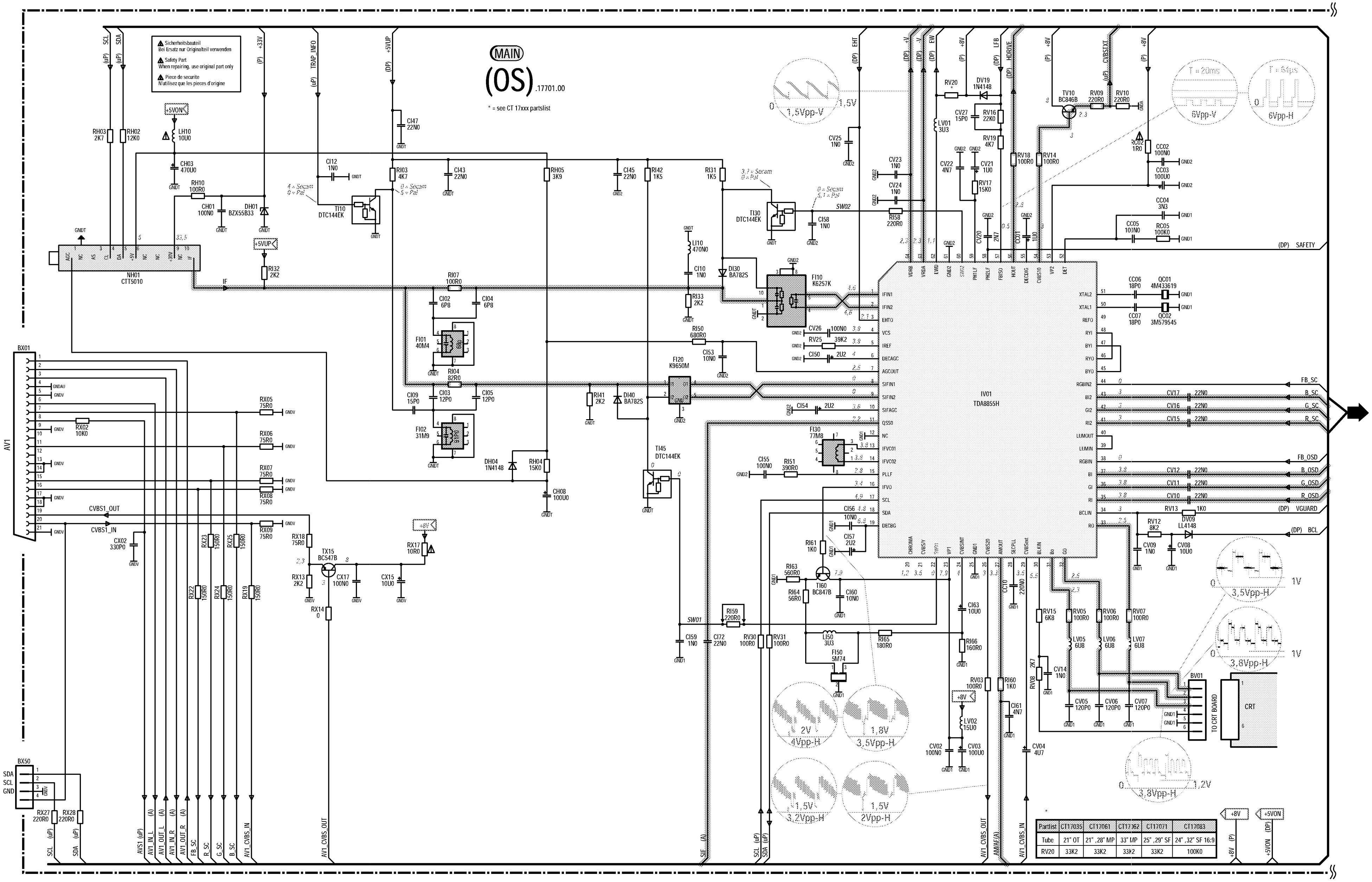

IRC2
MX27C4000MC-90
IR01
#
IR03
ST24C08M
M24C16MN6
BK01
FCB
BR01
TR15
BC856B
TR13
BCR141
TR20
DTC113ZK
TR40
BCR141
TR23
BCR141
TR60
BC847B
QR01
4M0
LR01
1U5
LR10
10U0
LR20
DR10
BAT42
DR05
LL42
DR20
1N4148
DR21
LL4148
DR22
LL4148
DR23
1N4148
DR24
LL4148
BR08
5V_VCC
U_STBY
+5V_STBY
+8V
+5VUP
VDDA
5VUP
GNDA
GNDP
(P) +8V
(P) +5VUP
(P) U_STBY
(P) +5V_UP
(OS) CVBSTXT
(P) RESET-
(DP) LFB
(DP) VFLB
(OS) R_OSD
(OS) G_OSD
(OS) B_OSD
(OS) FB_OSD
(DP) BCC
(OS) TRAP_INFO
(DP) FORMAT
(OS) AV3_PORT
(OS) AVS1
(OS) AVS2
(P) PO
(P) RESET-
(P) STBY_ON
STBY_ON (P)
POWER_FAIL (P)
MUTE- (A)
RESET_MSP- (A)
AV_LINK (OS)
SCL (OS,A)
SDA (OS,A)
Led-Port
Stby-Port
Po-Port
Format-detect
6,8 = TV
7,1 = Stdby
6 = TV
7,1 = Stdby
6,7 = TV
5,3 = Stdby
0 = TV
7,1 = Stdby
4,8 = TV
0 = Stdby
0,3 = TV
0,15 = Stdby
0,7 = TV
0 = Stdby
4,8 = TV
0 = Mute
0 = TV
5 = Mute
0 = Stdby
0,2 = Stdby
(RP).17000.00
(RP).17001.00
MAIN
(RP).17900.00
(RP).17700.00
(RP).17701.00

RR44	4/3
RR48	16/9

* = value see partlist DP 17… 00

#	IR01	RR67	RR69
RP 17000 00	ST92R195 CUT 2.2 JAL (10592030)		
RP 17001 00	ST92R195 CUT 2.2 JAM (10588150)		
RP 17900 00	ST92R195 CUT 2.2 XXX (10588150)		
RP 17700 00	ST92R195 CUT 2.2 JAL (10592030)	47K0	4K7
RP 17701 00	ST92R195 CUT 2.2 JAM (10588150)	4K7	47K0

RF/FI/ SCART INTERFACE/VIDEO SIGNAL PROCESSING -HF/FI INTERFACE PERITELEVISION/TRAITEMENT LUMINANCE CHROMINANCE - HF/ZF/ SCART INTERFACE/VIDEO SIGNALVERARBEITUNG - RF/FI /PRESA PERITEL/ELABORAZIONE VIDEO - RF/FI /EUROCONECTOR/TRATAMENTO VIDEO


MAIN
(OS).17701.00
SCL
SDA
+33V
TRAP_INFO
+5VUP
+5VON
NH01
CTT5010
IF
BX01
AV1
BX50
CVBS1_OUT
CVBS1_IN
TX15
BC547B
TI10
DTC144EK
TI30
DTC144EK
TI45
DTC144EK
TI60
BC847B
TV10
BC846B
FI01
40M4
FI02
31M9
FI10
K6257K
FI20
K9650M
FI30
77M8
FI50
5M74
DI30
BA782S
DI40
BA782S
DH01
BZX55B33
DH04
1N4148
DV19
1N4148
DV09
LL4148
QC01
4M433619
QC02
3M579545
IV01
TDA8855H
SW01
SW02
FB_SC
B_SC
G_SC
R_SC
FB_OSD
B_OSD
G_OSD
R_OSD
VGUARD
BCL
SAFETY
EHT
EW
LFB
HDRIVE
CVBSTXT
BV01
TO CRT BOARD
CRT
AV1_CVBS_OUT
AMAF(A)
AV1_CVBS_IN
SIF
AVS1
AV1_IN_L
AV1_OUT_L
AV1_IN_R
AV1_OUT_R
AV1_CVBS_IN
1,5Vpp-V
6Vpp-V
6Vpp-H
3,5Vpp-H
3,8Vpp-H
4Vpp-H
2Vpp-H
3,2Vpp-H
T = 20ms
T = 64µs

Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden

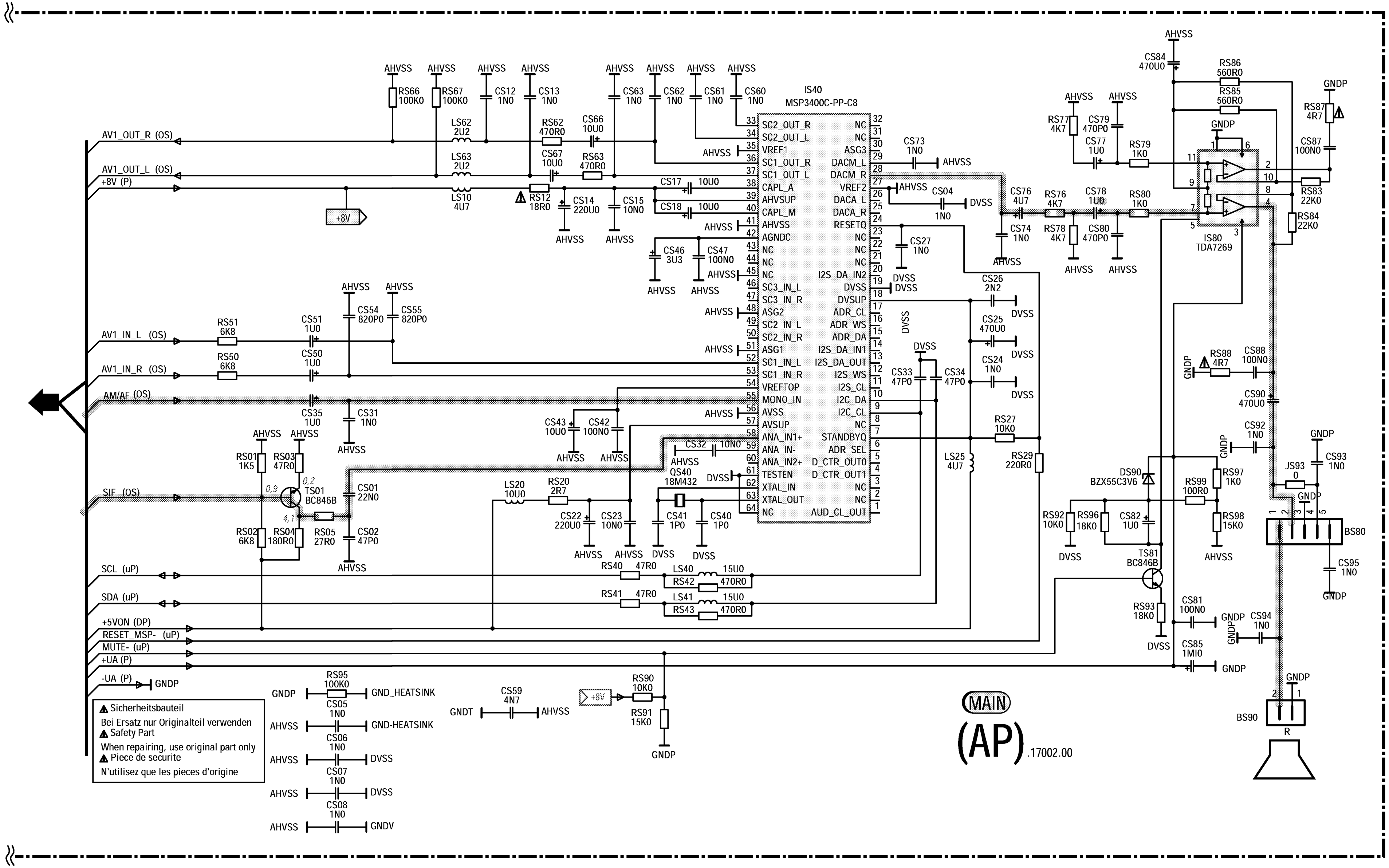
Safety Part
When repairing, use original part only

Piece de securite
N'utilisez que les pieces d'origine

* = see CT 17xxx partslist

Partlist	CT17035	CT17061	CT17062	CT17071	CT17083
Tube	21" OT	21" ,28" MP	33" MP	25" ,29" SF	24" ,32" SF 16:9
RV20	33K2	33K2	33K2	33K2	100K0

AMPLIFIER SCHEMATIC DIAGRAM - SCHEMA DE L'AMPLIFICATEUR - SCHALTBILD AUDIO-SIGNALVERABEITUNG - SCHEMA DELL' AMPLIFICATORE - ESQUEMA DEL AMPLIFICADOR
(MONO)


IS40
MSP3400C-PP-C8
IS80
TDA7269
AV1_OUT_R (OS)
AV1_OUT_L (OS)
+8V (P)
+8V
AV1_IN_L (OS)
AV1_IN_R (OS)
AM/AF (OS)
SIF (OS)
SCL (uP)
SDA (uP)
+5VON (DP)
RESET_MSP- (uP)
MUTE- (uP)
+UA (P)
-UA (P)
GNDP
AHVSS
DVSS
GNDP
GND_HEATSINK
GND-HEATSINK
GNDT
GNDV
SC2_OUT_R
SC2_OUT_L
VREF1
SC1_OUT_R
SC1_OUT_L
CAPL_A
AHVSUP
CAPL_M
AHVSS
AGNDC
NC
SC3_IN_L
SC3_IN_R
ASG2
SC2_IN_L
SC2_IN_R
ASG1
SC1_IN_L
SC1_IN_R
VREFTOP
MONO_IN
AVSS
AVSUP
ANA_IN1+
ANA_IN-
ANA_IN2+
TESTEN
XTAL_IN
XTAL_OUT
ASG3
DACM_L
DACM_R
VREF2
DACA_L
DACA_R
RESETQ
I2S_DA_IN2
DVSUP
ADR_CL
ADR_WS
ADR_DA
I2S_DA_IN1
I2S_DA_OUT
I2S_WS
I2S_CL
I2C_DA
I2C_CL
STANDBYQ
ADR_SEL
D_CTR_OUT0
D_CTR_OUT1
AUD_CL_OUT
RS66 100K0
RS67 100K0
CS12 1N0
CS13 1N0
LS62 2U2
LS63 2U2
LS10 4U7
RS62 470R0
CS66 10U0
CS67 10U0
RS63 470R0
RS12 18R0
CS14 220U0
CS15 10N0
CS63 1N0
CS62 1N0
CS61 1N0
CS60 1N0
CS17 10U0
CS18 10U0
CS46 3U3
CS47 100N0
CS73 1N0
CS04 1N0
CS27 1N0
CS26 2N2
CS25 470U0
CS24 1N0
CS33 47P0
CS34 47P0
RS27 10K0
RS29 220R0
LS25 4U7
RS51 6K8
RS50 6K8
CS51 1U0
CS50 1U0
CS54 820P0
CS55 820P0
CS35 1U0
CS31 1N0
RS01 1K5
RS03 47R0
TS01 BC846B
RS02 6K8
RS04 180R0
RS05 27R0
CS01 22N0
CS02 47P0
CS43 10U0
CS42 100N0
CS32 10N0
QS40 18M432
LS20 10U0
RS20 2R7
CS22 220U0
CS23 10N0
CS41 1P0
CS40 1P0
RS40 47R0
RS41 47R0
LS40 15U0
LS41 15U0
RS42 470R0
RS43 470R0
RS95 100K0
CS05 1N0
CS06 1N0
CS07 1N0
CS08 1N0
CS59 4N7
RS90 10K0
RS91 15K0
CS84 470U0
RS86 560R0
RS85 560R0
RS87 4R7
CS87 100N0
RS77 4K7
CS79 470P0
CS77 1U0
RS79 1K0
RS83 22K0
RS84 22K0
CS76 4U7
RS76 4K7
CS78 1U0
RS80 1K0
CS74 1N0
RS78 4K7
CS80 470P0
RS88 4R7
CS88 100N0
CS90 470U0
CS92 1N0
JS93 0
CS93 1N0
DS90 BZX55C3V6
RS99 100R0
RS97 1K0
RS98 15K0
RS92 10K0
RS96 18K0
CS82 1U0
TS81 BC846B
RS93 18K0
BS80
CS95 1N0
CS81 100N0
CS94 1N0
CS85 1MI0
BS90
R
MAIN
(AP).17002.00

⚠ Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden
⚠ Safety Part
When repairing, use original part only
⚠ Piece de securite
N'utilisez que les pieces d'origine

POWER SUPPLY - ALIMENTATION - NETZTEIL - ALIMENTAZIONE - ALIMENTACIÓN

(5) : standby

Note :
During measurements in the power supply unit
- Use the primary power unit ground (PGND).

Attention :
Mesure dans le bloc alimentation
- Utiliser la masse du bloc alimentation (PGND).

Achtung :
Bei Messungen im Primärnetzteil
- Primärnetzteilmasse verwenden (PGND).

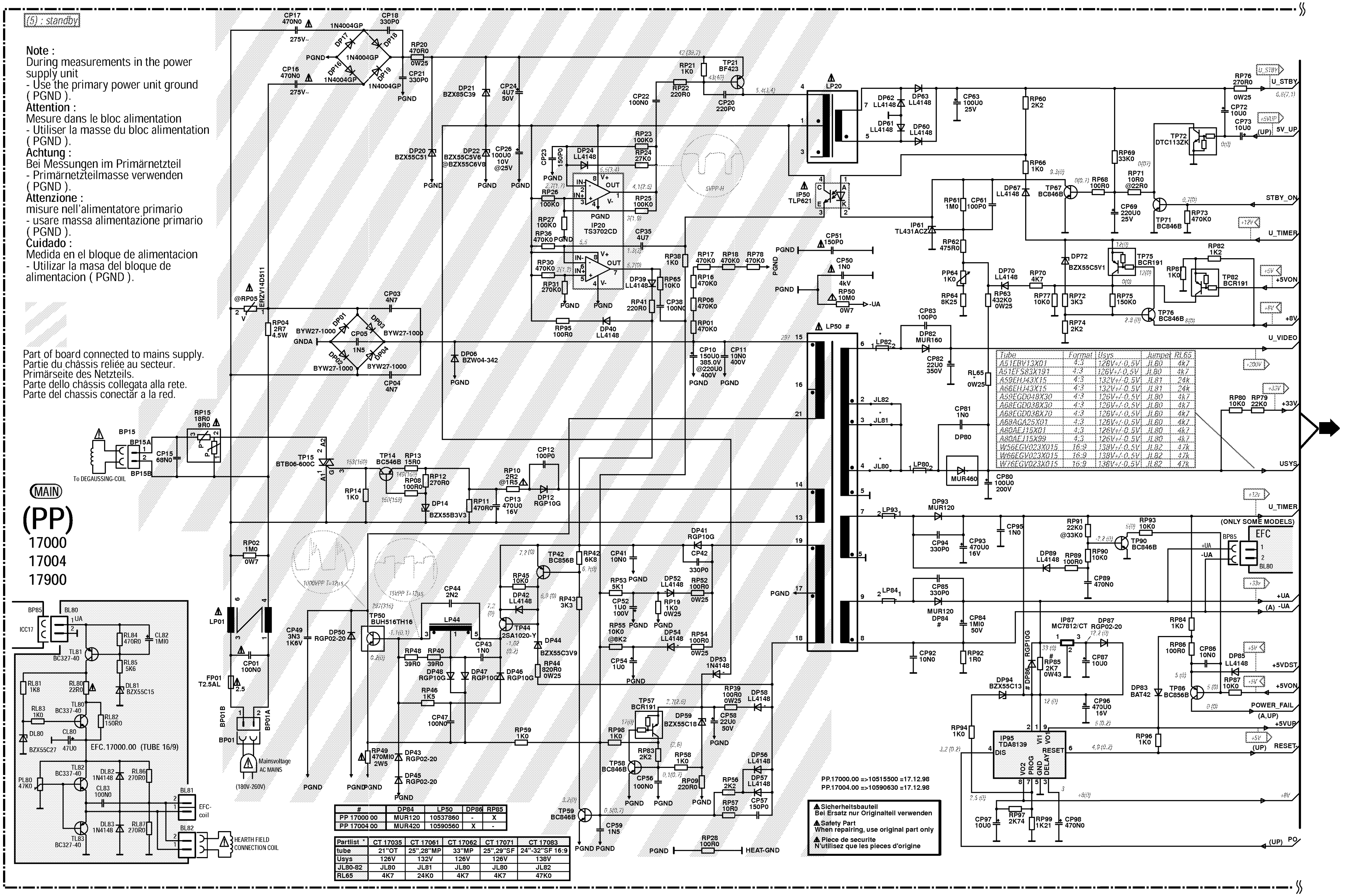
Attenzione :
misure nell'alimentatore primario
- usare massa alimentazione primario (PGND).

Cuidado :
Medida en el bloque de alimentacion
- Utilizar la masa del bloque de alimentacion (PGND).

Part of board connected to mains supply.
Partie du châssis reliée au secteur.
Primärseite des Netzteils.
Parte dello châssis collegata alla rete.
Parte del chassis conectar a la red.

MAIN

(PP)
17000
17004
17900



BP15
To DEGAUSSING-COIL
RP15 18R0 9R0
TP15 BTB06-600C
TP14 BC546B
CP17 470N0 275V~
CP16 470N0 275V~
1N4004GP
PGND
DP20 BZX55C51
DP21 BZX85C39
DP22 BZX55C5V6 @BZX55C6V8
IP20 TS3702CD
TP21 BF423
LP20
IP50 TLP621
IP61 TL431ACZ
TP67 BC846B
TP71 BC846B
TP72 DTC113ZK
TP75 BCR191
TP76 BC846B
TP82 BCR191
LP50 #
LP01
FP01 T2.5AL
BP01
Mainsvoltage AC MAINS
(180V-260V)
TP50 BUH516TH16
LP44
TP44 2SA1020-Y
TP42 BC856B
TP57 BCR191
TP58 BC846B
TP59 BC846B
IP87 MC7812/CT
IP95 TDA8139
TP86 BC856B
TP90 BC846B
U_STBY
5V_UP
STBY_ON
U_TIMER
+5VON
+8V
U_VIDEO
+33V
USYS
(ONLY SOME MODELS)
EFC
+UA
-UA
+5VDST
POWER_FAIL
+5VUP
RESET
PO
HEAT-GND
EFC.17000.00 (TUBE 16/9)
EFC-coil
HEARTH FIELD CONNECTION COIL

PP.17000.00 =>10515500 =17.12.98
PP.17004.00 =>10590630 =17.12.98

Tube	Format	Usys	Jumper	RL65
A51EBV13X01	4:3	128V+/-0,5V	JL80	4k7
A51EFS83X191	4:3	126V+/-0,5V	JL80	4k7
A59EHJ43X15	4:3	132V+/-0,5V	JL81	24k
A66EHJ43X15	4:3	132V+/-0,5V	JL81	24k
A59EGD048X30	4:3	126V+/-0,5V	JL80	4k7
A68EGD038X30	4:3	126V+/-0,5V	JL80	4k7
A68EGD038X70	4:3	126V+/-0,5V	JL80	4k7
A68AGA25X01	4:3	126V+/-0,5V	JL80	4k7
A80AEJ15X01	4:3	126V+/-0,5V	JL80	4k7
A80AEJ15X99	4:3	126V+/-0,5V	JL80	4k7
W56EGV023X015	16:9	138V+/-0,5V	JL82	47k
W66EGV023X015	16:9	138V+/-0,5V	JL82	47k
W76EGV023X015	16:9	138V+/-0,5V	JL82	47k

#	DP84	LP50	DP86	RP85
PP 17000 00	MUR120	10537860	-	X
PP 17004 00	MUR420	10590560	X	-

Partlist *	CT 17035	CT 17061	CT 17062	CT 17071	CT 17083
tube	21"OT	25",28"MP	33"MP	25",29"SF	24"-32"SF 16:9
Usys	126V	132V	126V	126V	138V
JL80-82	JL80	JL81	JL80	JL80	JL82
RL65	4K7	24K0	4K7	4K7	47K0

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⚠ **Safety Part**
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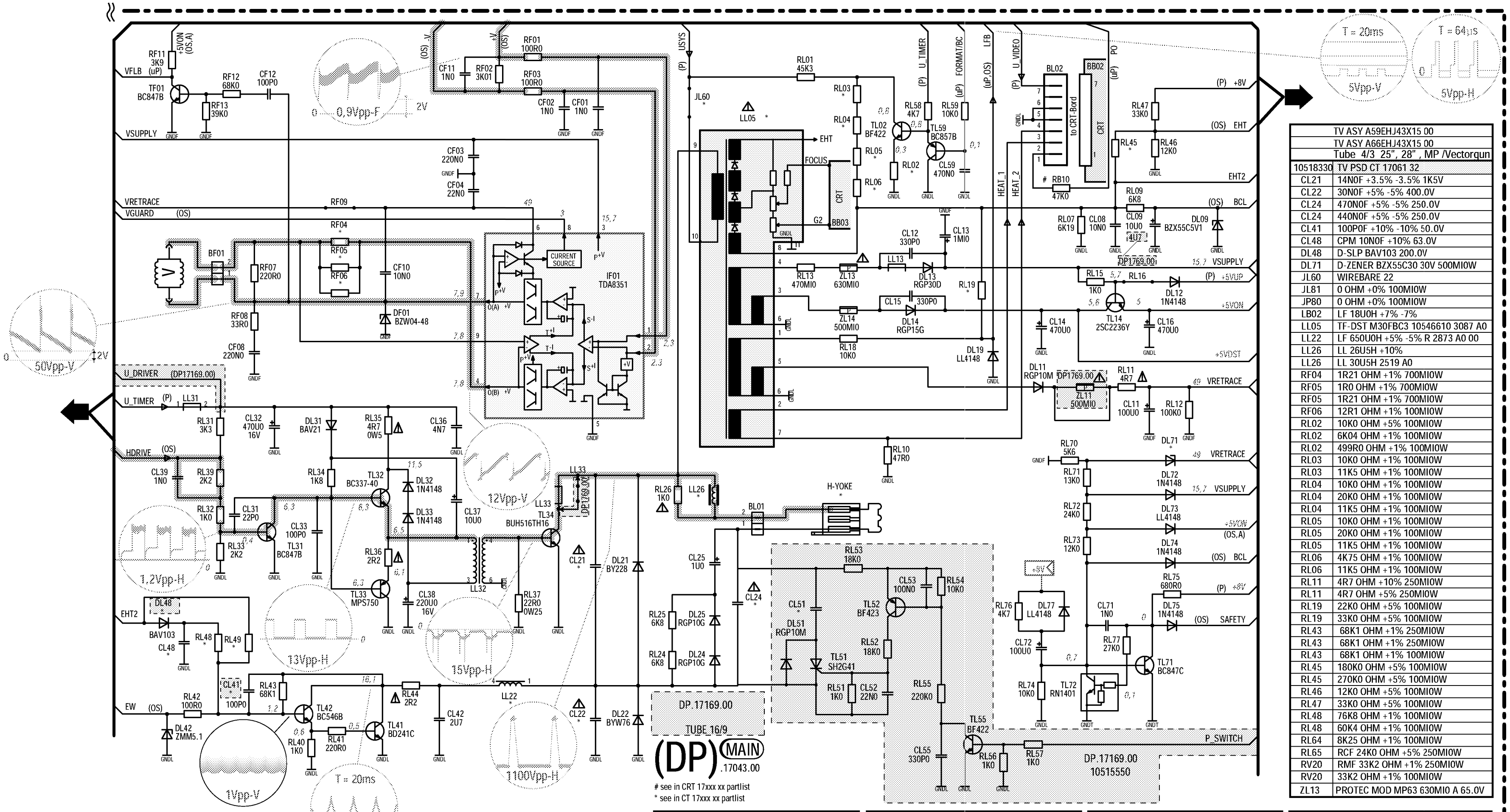
⚠ **Piece de securite**
N'utilisez que les pieces d'origine

SCANNING - BALAYAGE - ABLENKUNG - BARRIDO - SCANSIONE


VFLB (uP)
VSUPPLY
VRETRACE
VGUARD (OS)
U_DRIVER (DP17169.00)
U_TIMER (P)
HDRIVE (OS)
EHT2
EW (OS)
+5VON (OS,A)
USYS
U_TIMER
FORMAT/BC
LFB
U_VIDEO
PO
IF01
TDA8351
CURRENT SOURCE
TF01 BC847B
BF01
DF01 BZW04-48
TL31 BC847B
TL32 BC337-40
TL33 MPS750
TL34 BUH516TH16
TL41 BD241C
TL42 BC546B
TL51 SH2G41
TL52 BF423
TL55 BF422
TL59 BC857B
TL02 BF422
TL14 2SC2236Y
TL71 BC847C
TL72 RN1401
LL05
LL22
LL26
LL32
LL33
H-YOKE
EHT
FOCUS
CRT
G2
BB03
BL02
BB02
to CRT-Bord
HEAT_1
HEAT_2
(P) +8V
(OS) EHT
EHT2
(OS) BCL
VSUPPLY
(P) +5VUP
+5VON
+5VDST
VRETRACE
VSUPPLY
(OS,A)
(OS) BCL
(P) +8V
(OS) SAFETY
P_SWITCH
DP.17169.00 TUBE 16/9
DP.17169.00 10515550
(DP) MAIN .17043.00
0,9Vpp-F
50Vpp-V
1,2Vpp-H
12Vpp-V
13Vpp-H
15Vpp-H
1Vpp-V
12Vpp-V
1100Vpp-H
T = 20ms
T = 20ms
T = 64µs
5Vpp-V
5Vpp-H

# see in CRT 17xxx xx partlist

* see in CT 17xxx xx partlist

TV ASY A59EHJ43X15 00	
	TV ASY A66EHJ43X15 00
	Tube 4/3 25", 28" , MP /Vectorgun
10518330	TV PSD CT 17061 32
CL21	14N0F +3.5% -3.5% 1K5V
CL22	30N0F +5% -5% 400.0V
CL24	470N0F +5% -5% 250.0V
CL24	440N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	CPM 10N0F +10% 63.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL81	0 OHM +0% 100MI0W
JP80	0 OHM +0% 100MI0W
LB02	LF 18U0H +7% -7%
LL05	TF-DST M30FBC3 10546610 3087 A0
LL22	LF 650U0H +5% -5% R 2873 A0 00
LL26	LL 26U5H +10%
LL26	LL 30U5H 2519 A0
RF04	1R21 OHM +1% 700MI0W
RF05	1R0 OHM +1% 700MI0W
RF05	1R21 OHM +1% 700MI0W
RF06	12R1 OHM +1% 100MI0W
RL02	10K0 OHM +5% 100MI0W
RL02	6K04 OHM +1% 100MI0W
RL02	499R0 OHM +1% 100MI0W
RL03	10K0 OHM +1% 100MI0W
RL03	11K5 OHM +1% 100MI0W
RL04	10K0 OHM +1% 100MI0W
RL04	20K0 OHM +1% 100MI0W
RL04	11K5 OHM +1% 100MI0W
RL05	10K0 OHM +1% 100MI0W
RL05	20K0 OHM +1% 100MI0W
RL05	11K5 OHM +1% 100MI0W
RL06	4K75 OHM +1% 100MI0W
RL06	11K5 OHM +1% 100MI0W
RL11	4R7 OHM +10% 250MI0W
RL11	4R7 OHM +5% 250MI0W
RL19	22K0 OHM +5% 100MI0W
RL19	33K0 OHM +5% 100MI0W
RL43	68K1 OHM +1% 250MI0W
RL43	68K1 OHM +1% 250MI0W
RL43	68K1 OHM +1% 100MI0W
RL45	180K0 OHM +5% 100MI0W
RL45	270K0 OHM +5% 100MI0W
RL46	12K0 OHM +5% 100MI0W
RL47	33K0 OHM +5% 100MI0W
RL48	76K8 OHM +1% 100MI0W
RL48	60K4 OHM +1% 100MI0W
RL64	8K25 OHM +1% 100MI0W
RL65	RCF 24K0 OHM +5% 250MI0W
RV20	RMF 33K2 OHM +1% 250MI0W
RV20	33K2 OHM +1% 100MI0W
ZL13	PROTEC MOD MP63 630MI0 A 65.0V

	TV ASY A80AEJ15X01 (A) 00
	Tube 4/3 33" , MP
10575830	TV PSD CT 17062 26
CL21	16N2F +3.5% -3.5% 1K6V
CL22	30N0F +5% -5% 400.0V
CL24	560N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	10N0F +10% 63.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0% 100MI0W
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29 TBD 11
LL22	LF 650U0H +5% -5% R 2873 A0 00
LL26	LL 26U5H +10%
RF05	1R21 OHM +1% 700MI0W
RF06	10R0 OHM +1% 100MI0W
RL02	6K04 OHM +1% 100MI0W
RL03	4K75 OHM +1% 100MI0W
RL04	4K75 OHM +1% 100MI0W
RL05	4K75 OHM +1% 100MI0W
RL06	6K81 OHM +1% 100MI0W
RL19	13K0 OHM +5% 100MI0W
RL45	150K0 OHM +5% 100MI0W
RL48	76K8 OHM +1% 100MI0W
RL49	560K0 OHM +5% 100MI0W
RL65	RCF 4K7 OHM +5% 250MI0W
RV20	RMF 23K7 OHM +1% 250MI0W

	TV ASY A51EFS83X191 03
	Tube 4/3 21" OT
10555770	TV PSD CT 17035 26
CL21	8N3F +3.5% -3.5% 1K6V
CL22	33N0F +5% -5% 1K0V
CL24	440N0F +5% -5% 250.0V
CL41	1N0F +10% -10% 50.0V
DL71	D-ZENER BZX55C24 24V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0% 100MI0W
LB02	LF 18U0H +7% -7%
LL05	TF-DST M30FBC3 10555640 3087 A0
LL22	LF 650U0H +5% -5% R 2873 A0 00
LL26	LL 85U0H 2519 A0
RF05	1R5 OHM +1% 700MI0W
RF06	10R0 OHM +1% 100MI0W
RL02	6K04 OHM +1% 100MI0W
RL03	10K0 OHM +1% 100MI0W
RL04	10K0 OHM +1% 100MI0W
RL05	10K0 OHM +1% 100MI0W
RL06	3K32 OHM +1% 100MI0W
RL45	110K0 OHM +5% 100MI0W
RL49	60K4 OHM +1% 100MI0W
RL65	4K7 OHM +5% 250MI0W
RV20	23K7 OHM +1% 250MI0W

	TV ASY A59EGD048X30 19
	TV ASY A68EGD038X30 (A) 68 00
	Tube 4/3 25" SF, 29" SF
10515520	TV PSD CT 17071 26
CL21	16N2F +3.5% -3.5% 1K6V
CL22	30N0F +5% -5% 400.0V
CL24	510N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	10N0F +10% 63.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0% 100MI0W
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29 TBD 13
LL22	LF 650U0H +5% -5%
LL26	LL 26U5H +10%
RF05	RMF 1R0 OHM +1% 700MI0W
RL02	6K8 OHM +5% 100MI0W
RL03	4K75 OHM +1% 100MI0W
RL04	4K75 OHM +1% 100MI0W
RL05	4K75 OHM +1% 100MI0W
RL06	4K75 OHM +1% 100MI0W
RL19	15K0 OHM +5% 100MI0W
RL45	180K0 OHM +5% 100MI0W
RL48	100K0 OHM +5% 100MI0W
RL49	300K0 OHM +5% 100MI0W
RL65	4K7 OHM +5% 250MI0W
RV20	33K2 OHM +1% 250MI0W

	TV ASY W56EGV023X015 56 01 TV ASY W66EGV023X015 66 00
	TV ASY W76EGV023X015 (A) 00
	Tube 16/9 24", 28",32", SF / vectorgun
10515530	TV PSD CT 17083 38
CL21	15N5F +3.5% -3.5% 1K6V
CL22	27N0F +5% -5% 400.0V
CL24	440N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	100N0F +5% 63.0V
CL51	290N0F +5% -5% 250.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55C24 24V 500MI0W
JL60	WIREBARE 22
JL82	0 OHM +0% 100MI0W
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29 15314460 10
LL22	LF 650U0H +5% -5%
LL26	LL 30U5H 2519 A0
RF05	1R21 OHM +1% 700MI0W
RL02	4K99 OHM +1% 100MI0W
RL03	6K49 OHM +1% 100MI0W
RL04	6K49 OHM +1% 100MI0W
RL05	6K49 OHM +1% 100MI0W
RL06	2K37 OHM +1% 100MI0W
RL19	13K0 OHM +5% 100MI0W
RL45	390K0 OHM +5% 100MI0W
RL48	220K0 OHM +5% 100MI0W
RL49	180K0 OHM +5% 100MI0W
RL65	47K0 OHM +5% 250MI0W
RV20	100K0 OHM +1% 250MI0W

⚠ Indicates critical safety components, and identical components should be used for replacement. Only then can the operational safety be garanteed.

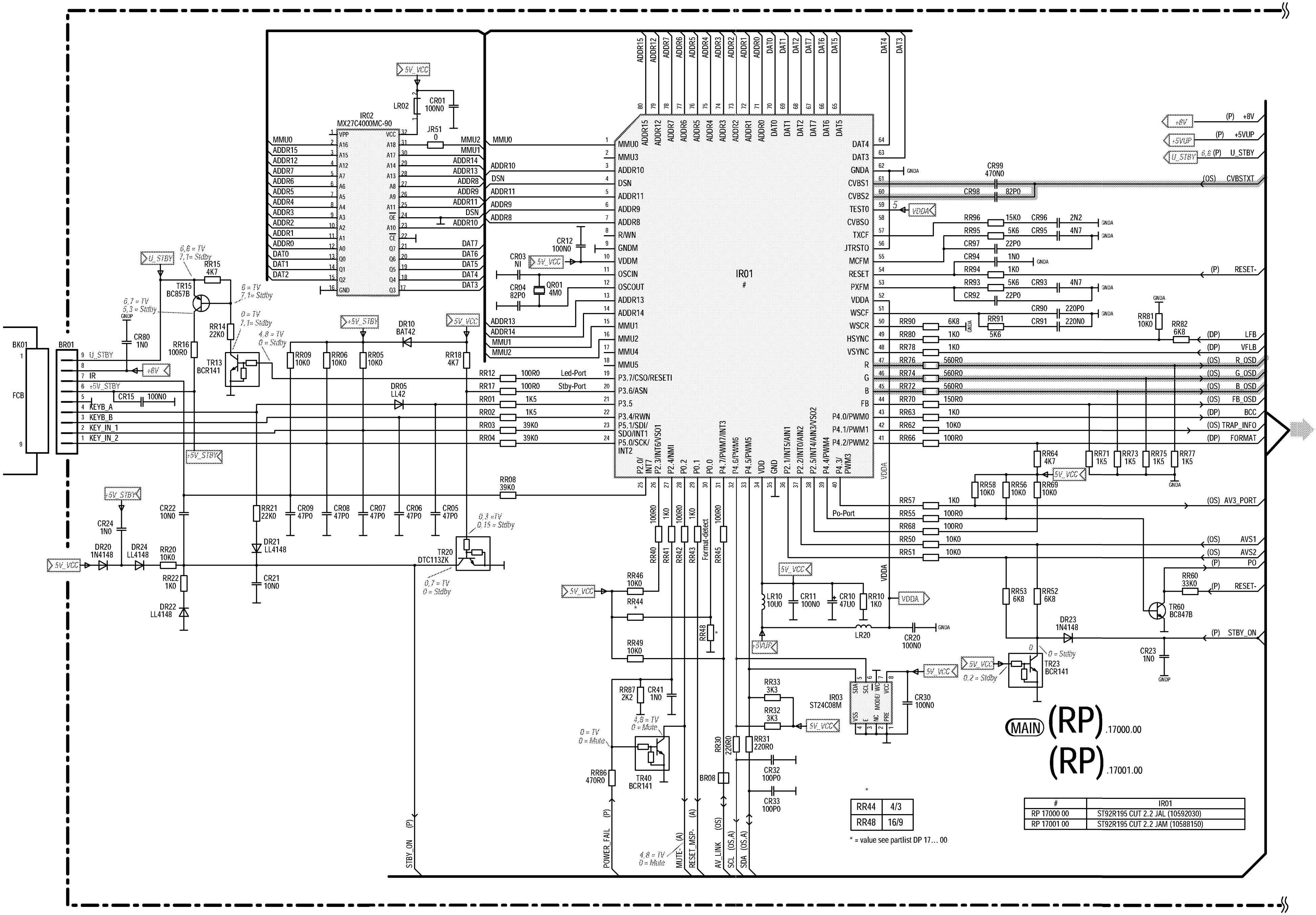
Le remplacement des éléments de sécurité (repérés avec le symbole ⚠) par des composants non homologués selon la Norme CEI 65 entraine la non-conformité de l'appareil.
Dans ce cas, la responsabilité du fabricant n'est plus engagée.

Wenn Sicherheitsteile (mit dem Symbol ⚠ gekennzeichnet) durch nicht normgerechte Teile ersetzt werden, erlischt die Haftung des Herstellers.

La sostituzione degli elementi di sicurezza (contrassegnati con il segno ⚠) con componenti non omologati secondo la norma CEI 65 comporta la non conformitá dell'apparecchio.
In tal caso é "esclusa la responsabilità" del costruttore.

La subtitución de elementos de seguridad (marcados con el simbolo ⚠) por componentes no homologados segun la norma CEI 65, provoca la no conformidad del aparato.
En ese caso, el fabricante cesa de ser responsable.

CONTROL MICROPROCESSOR - MICROPROCESSEUR DE COMMANDE - MIKROPROZESSOR - MICROPROCESSORE DEI COMANDI - MICROPROCESADOR DE LOS MANDOS


IR01
IR02
MX27C4000MC-90
IR03
ST24C08M
BK01
BR01
FCB
9 U_STBY
8
7 IR
6 +5V_STBY
5
4 KEYB_A
3 KEYB_B
2 KEY_IN_1
1 KEY_IN_2
TR13 BCR141
TR15 BC857B
TR20 DTC113ZK
TR23 BCR141
TR40 BCR141
TR60 BC847B
QR01 4M0
DR10 BAT42
DR05 LL42
DR20 1N4148
DR24 LL4148
DR21 LL4148
DR22 LL4148
DR23 1N4148
LR02
LR10 10U0
LR20
BR08
MMU0
MMU1
MMU2
MMU3
MMU4
MMU5
ADDR8
ADDR9
ADDR10
ADDR11
ADDR12
ADDR13
ADDR14
ADDR15
DAT0
DAT1
DAT2
DAT3
DAT4
DAT5
DAT6
DAT7
DSN
R/WN
GNDM
VDDM
OSCIN
OSCOUT
P3.7/CSO/RESETI
P3.6/ASN
P3.5
P3.4/RWN
P5.1/SDI/SDO/INT1
P5.0/SCK/INT2
Led-Port
Stby-Port
Po-Port
Format-detect
GNDA
CVBS1
CVBS2
TEST0
CVBSO
TXCF
JTRSTO
MCFM
RESET
PXFM
VDDA
WSCF
WSCR
HSYNC
VSYNC
R
G
B
FB
P4.0/PWM0
P4.1/PWM1
P4.2/PWM2
(P) +8V
(P) +5VUP
(P) U_STBY
(OS) CVBSTXT
(P) RESET-
(DP) LFB
(DP) VFLB
(OS) R_OSD
(OS) G_OSD
(OS) B_OSD
(OS) FB_OSD
(DP) BCC
(OS) TRAP_INFO
(DP) FORMAT
(OS) AV3_PORT
(OS) AVS1
(OS) AVS2
(P) PO
(P) RESET-
(P) STBY_ON
STBY_ON (P)
POWER_FAIL (P)
MUTE- (A)
RESET_MSP- (A)
AV_LINK (OS)
SCL (OS,A)
SDA (OS,A)
5V_VCC
+5V_STBY
U_STBY
+8V
+5VUP
VDDA
6,6 = TV
7,1 = Stdby
0,3 = TV
0,15 = Stdby
0,7 = TV
0 = Stdby
4,8 = TV
0 = Mute
0 = TV
0 = Mute
0,2 = Stdby
MAIN (RP).17000.00
(RP).17001.00

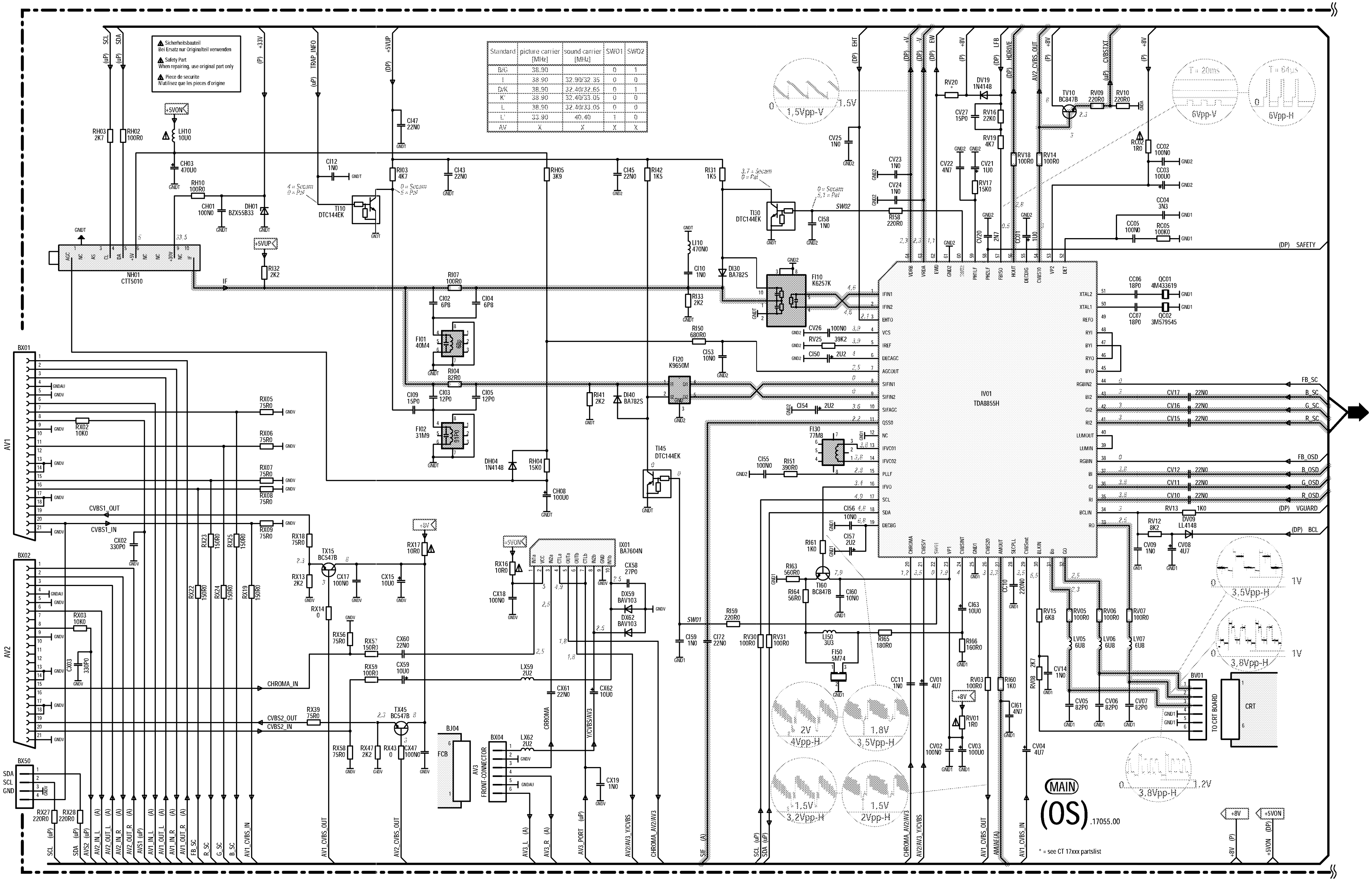
*

RR44	4/3
RR48	16/9

* = value see partlist DP 17… 00

#	IR01
RP 17000 00	ST92R195 CUT 2.2 JAL (10592030)
RP 17001 00	ST92R195 CUT 2.2 JAM (10588150)

RF/FI/ SCART INTERFACE/VIDEO SIGNAL PROCESSING -HF/FI INTERFACE PERITELEVISION/TRAITEMENT LUMINANCE CHROMINANCE - HF/ZF/ SCART INTERFACE/VIDEO SIGNALVERARBEITUNG - RF/FI /PRESA PERITEL/ELABORAZIONE VIDEO - RF/FI /EUROCONECTOR / TRATAMENTO VIDEO



⚠ Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden

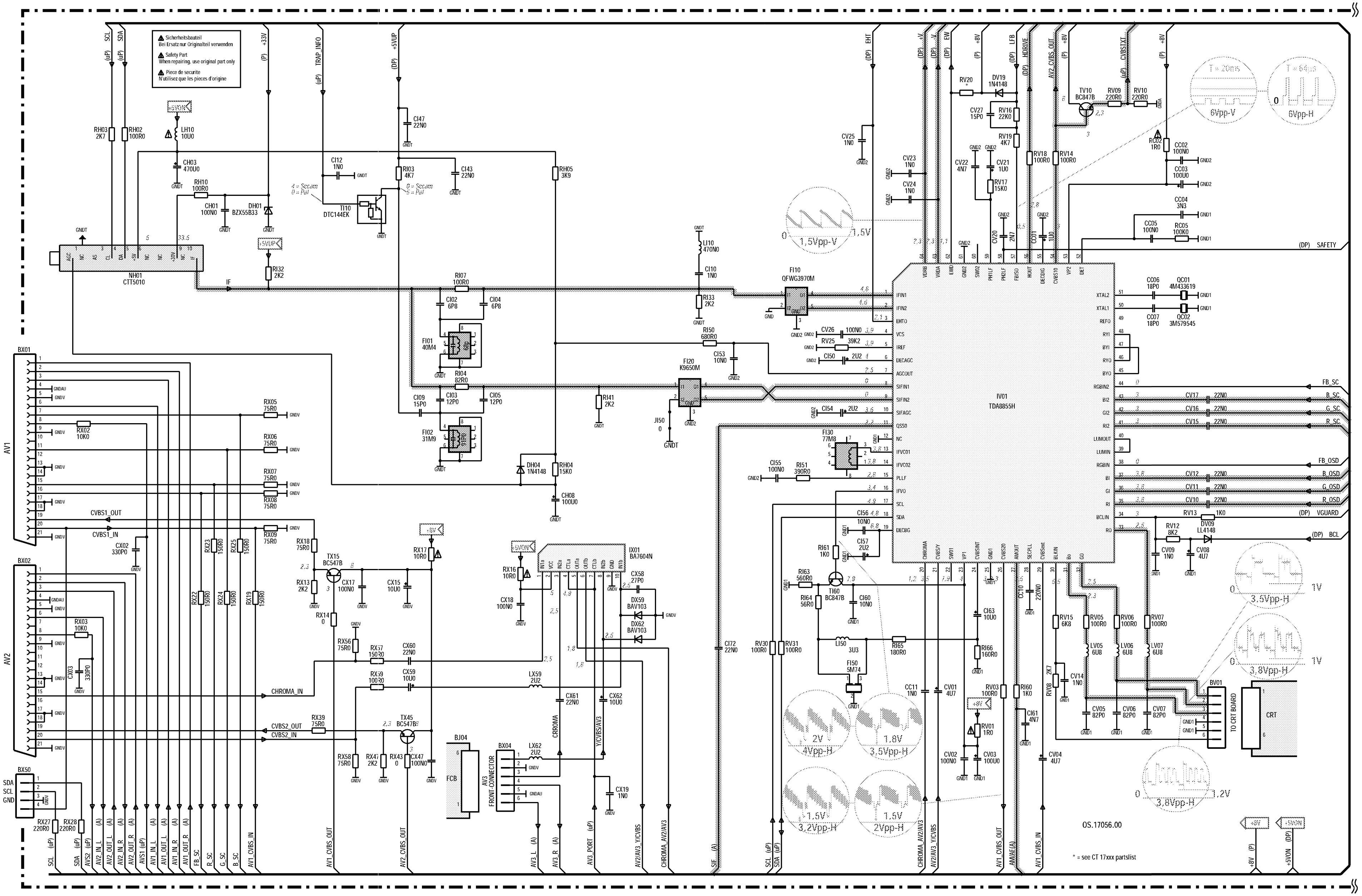
⚠ Safety Part
When repairing, use original part only

⚠ Piece de securite
N'utilisez que les pieces d'origine

Standard	picture carrier [MHz]	sound carrier [MHz]	SW01	SW02
B/G	38.90		0	1
I	38.90	32.90/32.35	0	0
D/K	38.90	32.40/32.65	0	1
K'	38.90	32.40/33.05	0	0
L	38.90	32.40/33.05	0	0
L'	33.90	40.40	1	0
AV	X	X	X	X

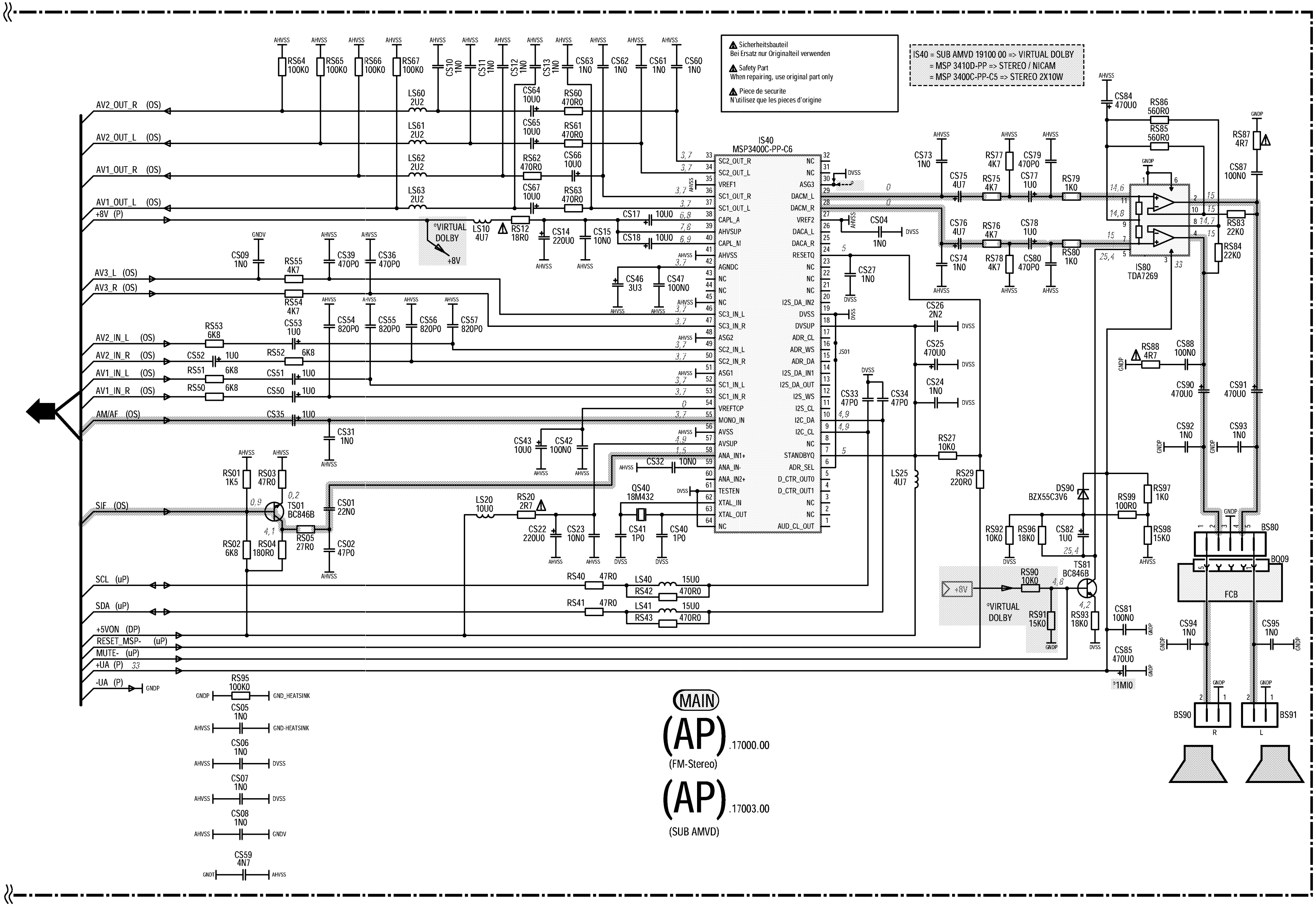
NH01
CTT5010
IV01
TDA8855H
IX01
BA7604N
FI10
K6257K
FI20
K9650M
FI01
40M4
FI02
31M9
FI30
77M8
FI50
5M74
TI10
DTC144EK
TI30
DTC144EK
TI45
DTC144EK
TX15
BC547B
TX45
BC547B
TI60
BC847B
TV10
BC847B
QC01
4M433619
QC02
3M579545
BX01
AV1
BX02
AV2
BX50
BX04
AV3
FRONT-CONNECTOR
BJ04
FCB
BV01
TO CRT BOARD
CRT
IF
SW01
SW02
CVBS1_OUT
CVBS1_IN
CVBS2_OUT
CVBS2_IN
CHROMA_IN
4 = Secam
0 = Pal
3,7 = Secam
0 = Pal
0 = Secam
5,1 = Pal
(DP) SAFETY
(DP) VGUARD
(DP) BCL
FB_SC
B_SC
G_SC
R_SC
FB_OSD
B_OSD
G_OSD
R_OSD
1,5Vpp-V
1,5V
T = 20ms
6Vpp-V
T = 64µs
6Vpp-H
3,5Vpp-H
3,8Vpp-H
1V
2V
4Vpp-H
1,8V
3,5Vpp-H
1,5V
3,2Vpp-H
1,5V
2Vpp-H
3,8Vpp-H
1,2V
MAIN
(OS)
.17055.00
* = see CT 17xxx partslist
+8V
+5VON

RF/FI/ SCART INTERFACE/VIDEO SIGNAL PROCESSING -HF/FI INTERFACE PERITELEVISION/TRAITEMENT LUMINANCE CHROMINANCE - HF/ZF/ SCART INTERFACE/VIDEO SIGNALVERARBEITUNG - RF/FI /PRESA PERITEL/ELABORAZIONE VIDEO - RF/FI /EUROCONECTOR/TRATAMENTO VIDEO



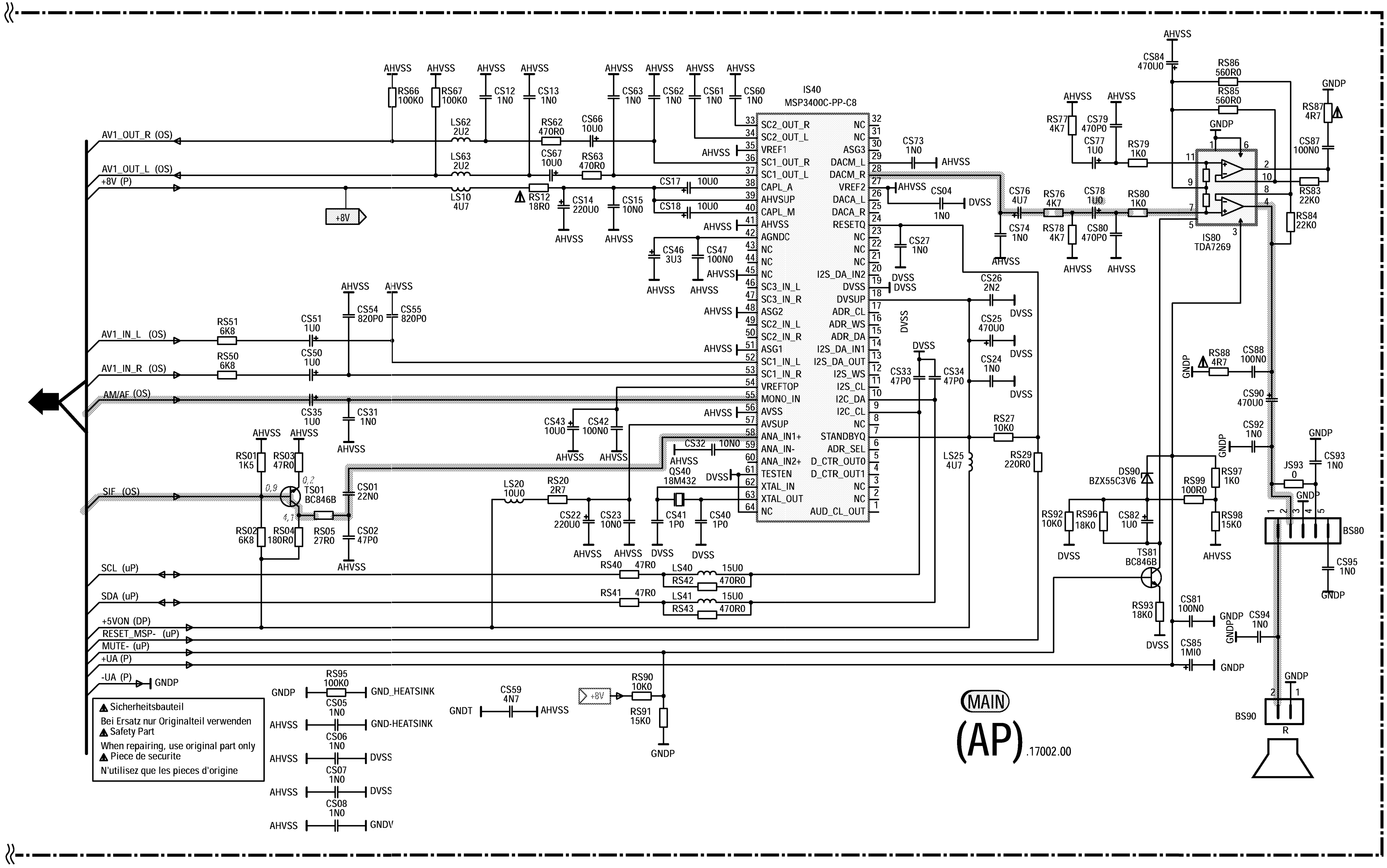
Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden
Safety Part
When repairing, use original part only
Piece de securite
N'utilisez que les pieces d'origine
NH01
CTT5010
IF
FI10
QFWG3970M
FI20
K9650M
FI30
77M8
FI01
40M4
FI02
31M9
IV01
TDA8855H
IX01
BA7604N
TI10
DTC144EK
TX15
BC547B
TX45
BC547B
TI60
BC847B
TV10
BC847B
DV19
1N4148
DH01
BZX55B33
DH04
1N4148
DV09
LL4148
QC01
4M433619
QC02
3M579545
BX01
AV1
BX02
AV2
BX50
SDA
SCL
GND
BJ04
FCB
BX04
AV3
FRONT-CONNECTOR
BV01
TO CRT BOARD
CRT
CVBS1_OUT
CVBS1_IN
CVBS2_OUT
CVBS2_IN
CHROMA_IN
CHROMA
Y/CVBS/AV3
(DP) SAFETY
FB_SC
B_SC
G_SC
R_SC
FB_OSD
B_OSD
G_OSD
R_OSD
(DP) VGUARD
(DP) BCL
(DP) EHT
(DP) -V
(DP) V
(DP) EW
(P) +8V
(DP) LFB
(DP) HDRIVE
AV2_CVBS_OUT
(P) +8V
(uP) CVBSTXT
(P) +8V
(uP) SCL
(uP) SDA
(P) +33V
(uP) TRAP_INFO
(DP) +5VUP
SCL (uP)
SDA (uP)
AVS2 (uP)
AV2_IN_L (A)
AV2_OUT_L (A)
AV2_IN_R (A)
AV2_OUT_R (A)
AVS1 (uP)
AV1_IN_L (A)
AV1_OUT_L (A)
AV1_IN_R (A)
AV1_OUT_R (A)
FB_SC
R_SC
G_SC
B_SC
AV1_CVBS_IN
AV1_CVBS_OUT
AV2_CVBS_OUT
AV3_L (A)
AV3_R (A)
AV3_PORT (uP)
AV2/AV3_Y/CVBS
CHROMA_AV2/AV3
SIF (A)
SCL (uP)
SDA (uP)
CHROMA_AV2/AV3
AV2/AV3_Y/CVBS
AV1_CVBS_OUT
AM/AE(A)
AV1_CVBS_IN
+8V (P)
+5VON (DP)
1,5Vpp-V
1,5V
T = 20ms
T = 64µs
6Vpp-V
6Vpp-H
3,5Vpp-H
1V
3,8Vpp-H
1V
3,8Vpp-H
1,2V
2V
4Vpp-H
1,8V
3,5Vpp-H
1,5V
3,2Vpp-H
1,5V
2Vpp-H
OS.17056.00
* = see CT 17xxx partslist

AMPLIFIER SCHEMATIC DIAGRAM - SCHEMA DE L'AMPLIFICATEUR - SCHALTBILD AUDIO-SIGNALVERABEITUNG - SCHEMA DELL' AMPLIFICATORE ESQUEMA DEL AMPLIFICADOR
(STEREO)

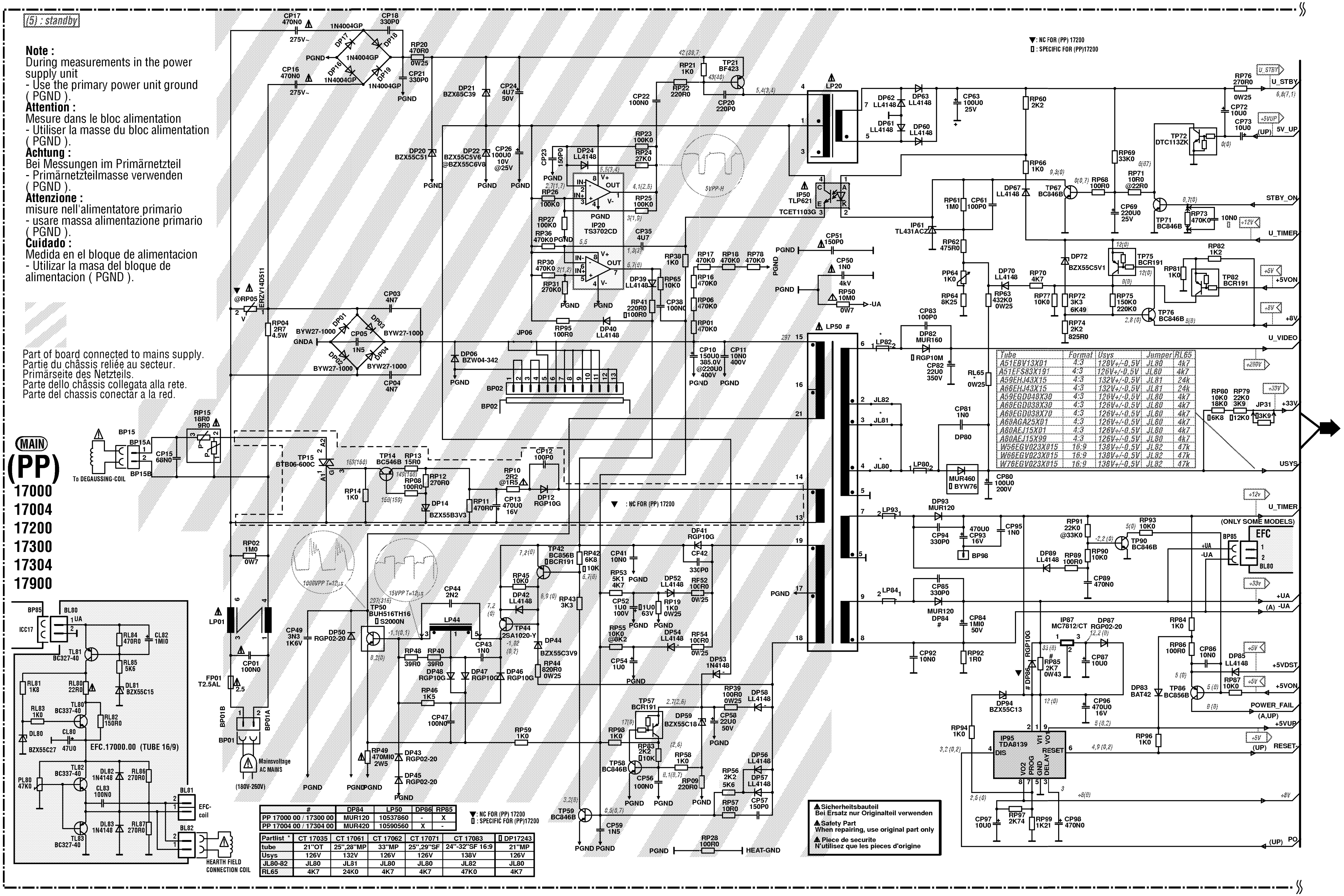


⚠ Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden
⚠ Safety Part
When repairing, use original part only
⚠ Piece de securite
N'utilisez que les pieces d'origine
IS40 = SUB AMVD 19100 00 => VIRTUAL DOLBY
= MSP 3410D-PP => STEREO / NICAM
= MSP 3400C-PP-C5 => STEREO 2X10W
IS40
MSP3400C-PP-C6
IS80
TDA7269
AV2_OUT_R (OS)
AV2_OUT_L (OS)
AV1_OUT_R (OS)
AV1_OUT_L (OS)
+8V (P)
AV3_L (OS)
AV3_R (OS)
AV2_IN_L (OS)
AV2_IN_R (OS)
AV1_IN_L (OS)
AV1_IN_R (OS)
AM/AF (OS)
SIF (OS)
SCL (uP)
SDA (uP)
+5VON (DP)
RESET_MSP- (uP)
MUTE- (uP)
+UA (P)
-UA (P)
°VIRTUAL DOLBY
+8V
TS01 BC846B
TS81 BC846B
DS90 BZX55C3V6
QS40 18M432
BS80
BQ09
FCB
BS90
BS91
R
L
°1MI0
MAIN
(AP).17000.00
(FM-Stereo)
(AP).17003.00
(SUB AMVD)

AMPLIFIER SCHEMATIC DIAGRAM - SCHEMA DE L'AMPLIFICATEUR - SCHALTBILD AUDIO-SIGNALVERABEITUNG - SCHEMA DELL' AMPLIFICATORE - ESQUEMA DEL AMPLIFICADOR
(MONO)


IS40
MSP3400C-PP-C8
SC2_OUT_R
SC2_OUT_L
VREF1
SC1_OUT_R
SC1_OUT_L
CAPL_A
AHVSUP
CAPL_M
AHVSS
AGNDC
NC
SC3_IN_L
SC3_IN_R
ASG2
SC2_IN_L
SC2_IN_R
ASG1
SC1_IN_L
SC1_IN_R
VREFTOP
MONO_IN
AVSS
AVSUP
ANA_IN1+
ANA_IN-
ANA_IN2+
TESTEN
XTAL_IN
XTAL_OUT
ASG3
DACM_L
DACM_R
VREF2
DACA_L
DACA_R
RESETQ
I2S_DA_IN2
DVSS
DVSUP
ADR_CL
ADR_WS
ADR_DA
I2S_DA_IN1
I2S_DA_OUT
I2S_WS
I2S_CL
I2C_DA
I2C_CL
STANDBYQ
ADR_SEL
D_CTR_OUT0
D_CTR_OUT1
AUD_CL_OUT
IS80
TDA7269
AV1_OUT_R (OS)
AV1_OUT_L (OS)
+8V (P)
AV1_IN_L (OS)
AV1_IN_R (OS)
AM/AF (OS)
SIF (OS)
SCL (uP)
SDA (uP)
+5VON (DP)
RESET_MSP- (uP)
MUTE- (uP)
+UA (P)
-UA (P)
GNDP
+8V
RS66 100K0
RS67 100K0
CS12 1N0
CS13 1N0
LS62 2U2
LS63 2U2
LS10 4U7
RS62 470R0
CS66 10U0
CS67 10U0
RS63 470R0
RS12 18R0
CS14 220U0
CS15 10N0
CS63 1N0
CS62 1N0
CS61 1N0
CS60 1N0
CS17 10U0
CS18 10U0
CS46 3U3
CS47 100N0
CS73 1N0
CS04 1N0
CS27 1N0
CS26 2N2
CS25 470U0
CS24 1N0
CS33 47P0
CS34 47P0
RS27 10K0
RS29 220R0
LS25 4U7
RS51 6K8
RS50 6K8
CS51 1U0
CS50 1U0
CS54 820P0
CS55 820P0
CS35 1U0
CS31 1N0
RS01 1K5
RS03 47R0
TS01 BC846B
RS02 6K8
RS04 180R0
RS05 27R0
CS01 22N0
CS02 47P0
CS43 10U0
CS42 100N0
CS32 10N0
QS40 18M432
LS20 10U0
RS20 2R7
CS22 220U0
CS23 10N0
CS41 1P0
CS40 1P0
RS40 47R0
RS41 47R0
LS40 15U0
LS41 15U0
RS42 470R0
RS43 470R0
CS84 470U0
RS86 560R0
RS85 560R0
RS87 4R7
CS87 100N0
RS77 4K7
CS79 470P0
CS77 1U0
RS79 1K0
CS76 4U7
RS76 4K7
CS78 1U0
RS80 1K0
CS74 1N0
RS78 4K7
CS80 470P0
RS83 22K0
RS84 22K0
RS88 4R7
CS88 100N0
CS90 470U0
CS92 1N0
JS93 0
CS93 1N0
DS90 BZX55C3V6
RS99 100R0
RS97 1K0
RS98 15K0
RS92 10K0
RS96 18K0
CS82 1U0
TS81 BC846B
RS93 18K0
CS81 100N0
CS94 1N0
CS85 1MI0
CS95 1N0
BS80
BS90
R
RS95 100K0
GND_HEATSINK
CS05 1N0
GND-HEATSINK
CS06 1N0
CS07 1N0
CS08 1N0
GNDV
CS59 4N7
GNDT
RS90 10K0
RS91 15K0
AHVSS
DVSS
GNDP
Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden
Safety Part
When repairing, use original part only
Piece de securite
N'utilisez que les pieces d'origine
MAIN
(AP).17002.00

POWER SUPPLY - ALIMENTATION - NETZTEIL - ALIMENTAZIONE - ALIMENTACIÓN


(5) : standby
MAIN
(PP)
17000
17004
17200
17300
17304
17900
▼: NC FOR (PP) 17200
▯ : SPECIFIC FOR (PP)17200
CP17 470N0
CP18 330P0
1N4004GP
DP17
DP18
DP16
DP19
CP16 470N0
275V~
PGND
RP20 470R0 0W25
CP21 330P0
DP21 BZX85C39
CP24 4U7 50V
DP20 BZX55C51
DP22 BZX55C5V6 @BZX55C6V8
CP26 100U0 10V @25V
TP21 BF423
RP21 1K0
RP22 220R0
CP22 100N0
CP20 220P0
LP20
DP62 LL4148
DP63 LL4148
DP61 LL4148
DP60 LL4148
CP63 100U0 25V
RP60 2K2
RP76 270R0
U_STBY
CP72 10U0
CP73 10U0
5V_UP
TP72 DTC113ZK
RP69 33K0
RP71 10R0 @22R0
RP66 1K0
RP68 100R0
TP67 BC846B
DP67 LL4148
CP69 220U0 25V
TP71 BC846B
RP73 470K0
STBY_ON
U_TIMER
IP20 TS3702CD
RP23 100K0
RP24 27K0
RP25 100K0
DP24 LL4148
CP23 150P0
RP26 100K0
RP27 100K0
RP36 470K0
RP30 470K0
RP31 270K0
CP35 4U7
5VPP-H
IP50 TLP621
TCET1103G
RP61 1M0
CP61 100P0
IP61 TL431ACZ
RP62 475R0
PP64 1K0
RP64 8K25
DP70 LL4148
RP70 4K7
RP63 432K0 0W25
RP77 10K0
RP72 3K3 6K49
RP74 2K2 825R0
DP72 BZX55C5V1
TP75 BCR191
RP75 150K0 220K0
TP76 BC846B
RP82 1K2
RP81 1K0
TP82 BCR191
+5VON
+8V
RP38 1K0
RP17 470K0
RP18 470K0
RP78 470K0
RP16 470K0
RP06 470K0
RP01 470K0
DP39 LL4148
RP65 10K0
RP41 220R0 100R0
CP38 100N0
CP51 150P0
CP50 1N0 4kV
RP50 10M0 0W7
-UA
RP95 100R0
DP40 LL4148
@RP05 ERZV14D511
RP04 2R7 4.5W
CP03 4N7
DP01
DP03
DP02
DP04
BYW27-1000
CP05 1N5
CP04 4N7
GNDA
JP06
DP06 BZW04-342
BP02
CP10 150U0 385.0V @220U0 400V
CP11 10N0 400V
LP50
LP82
CP83 100P0
DP82 MUR160
RGP10M
CP82 22U0 350V
RL65 0W25
U_VIDEO
JL82
JL81
JL80
CP81 1N0
DP80
LP80
MUR460 BYW76
CP80 100U0 200V
USYS
RP80 10K0 18K0
RP79 22K0 3K9
JP31
+33V
6K8
12K0
3K9
To DEGAUSSING-COIL
BP15
BP15A
BP15B
CP15 68N0
RP15 18R0 9R0
TP15 BTB06-600C
TP14 BC546B
RP13 15R0
RP08 100R0
RP12 270R0
RP14 1K0
DP14 BZX55B3V3
RP11 470R0
CP13 470U0 16V
RP10 2R2 @1R5
CP12 100P0
DP12 RGP10G
LP93
DP93 MUR120
CP94 330P0
470U0 CP93 16V
CP95 1N0
BP98
RP91 22K0 @33K0
RP93 10K0
TP90 BC846B
DP89 LL4148
RP89 100R0
RP90 10K0
CP89 470N0
(ONLY SOME MODELS)
BP85
EFC
BL80
+UA
-UA
LP84
CP85 330P0
MUR120 DP84
CP84 1MI0 50V
CP92 10N0
RP92 1R0
IP87 MC7812/CT
DP87 RGP02-20
RP85 2K7 0W43
CP87 10U0
DP86 RGP10G
RP84 1K0
RP86 100R0
CP86 10N0
DP85 LL4148
+5VDST
DP83 BAT42
TP86 BC856B
RP87 10K0
+5VON
POWER_FAIL
(A,UP)
DP94 BZX55C13
CP96 470U0 16V
RP94 1K0
IP95 TDA8139
RP96 1K0
+5VUP
RESET
CP97 10U0
RP97 2K74
RP99 1K21
CP98 470N0
PO
(UP)
RP02 1M0 0W7
LP01
CP01 100N0
FP01 T2.5AL
BP01
BP01A
BP01B
Mainsvoltage AC MAINS
(180V-260V)
1060VPP T=12µs
15VPP T=12µs
TP50 BUH516TH16 S2000N
DP50 RGP02-20
CP49 3N3 1K6V
CP44 2N2
LP44
RP48 39R0
RP40 39R0
DP48 RGP10G
DP47 RGP10G
DP46 RGP10G
CP43 1N0
TP44 2SA1020-Y
DP44 BZX55C3V9
RP44 820R0 0W25
RP46 1K5
CP47 100N0
RP49 470MI0 2W5
DP43 RGP02-20
DP45 RGP02-20
RP59 1K0
TP42 BC856B BCR191
RP42 6K8 10K
RP45 10K0
DP42 LL4148
RP43 3K3
CP41 10N0
RP53 5K1 4K7
CP52 1U0 100V
1U0 63V
RP19 1K0 0W25
RP55 10K0 @8K2
DP54 LL4148
RP54 10R0 0W25
CP54 1U0
DP52 LL4148
RP52 10R0 0W25
DF41 RGP10G
CF42 330P0
DP53 1N4148
RP39 100R0 0W25
DP58 LL4148
TP57 BCR191
DP59 BZX55C18
CP58 22U0 50V
RP98 1K0
RP83 2K2 10K
TP58 BC846B
RP58 1K0
CP56 100N0
RP09 220R0
RP56 2K2 5K6
DP56 LL4148
DP57 LL4148
RP57 10R0
CP57 150P0
TP59 BC846B
CP59 1N5
RP28 100R0
HEAT-GND
BP85
BL80
ICC17
1UA
TL81 BC327-40
RL84 470R0
CL82 1MI0
RL85 5K6
RL81 1K8
RL80 22R0
DL81 BZX55C15
TL80 BC337-40
RL83 1K0
RL82 150R0
DL80 BZX55C27
CL80 47U0
EFC.17000.00 (TUBE 16/9)
PL80 47K0
TL82 BC337-40
DL82 1N4148
RL86 270R0
CL83 100N0
DL83 1N4148
RL87 270R0
TL83 BC327-40
BL81
EFC-coil
BL82
HEARTH FIELD CONNECTION COIL

Note :
During measurements in the power supply unit
- Use the primary power unit ground (PGND).

Attention :
Mesure dans le bloc alimentation
- Utiliser la masse du bloc alimentation (PGND).

Achtung :
Bei Messungen im Primärnetzteil
- Primärnetzteilmasse verwenden (PGND).

Attenzione :
misure nell'alimentatore primario
- usare massa alimentazione primario (PGND).

Cuidado :
Medida en el bloque de alimentacion
- Utilizar la masa del bloque de alimentacion (PGND).

Part of board connected to mains supply.
Partie du châssis reliée au secteur.
Primärseite des Netzteils.
Parte dello châssis collegata alla rete.
Parte del chassis conectar a la red.

Tube	Format	Usys	Jumper	RL65
A51EBV13X01	4:3	128V+/-0,5V	JL80	4k7
A51EFS83X191	4:3	126V+/-0,5V	JL80	4k7
A59EHJ43X15	4:3	132V+/-0,5V	JL81	24k
A66EHJ43X15	4:3	132V+/-0,5V	JL81	24k
A59EGD048X30	4:3	126V+/-0,5V	JL80	4k7
A68EGD038X30	4:3	126V+/-0,5V	JL80	4k7
A68EGD038X70	4:3	126V+/-0,5V	JL80	4k7
A68AGA25X01	4:3	126V+/-0,5V	JL80	4k7
A80AEJ15X01	4:3	126V+/-0,5V	JL80	4k7
A80AEJ15X99	4:3	126V+/-0,5V	JL80	4k7
W56EGV023X015	16:9	138V+/-0,5V	JL82	47k
W66EGV023X015	16:9	138V+/-0,5V	JL82	47k
W76EGV023X015	16:9	138V+/-0,5V	JL82	47k

▼: NC FOR (PP) 17200

#	DP84	LP50	DP86	RP85
PP 17000 00 / 17300 00	MUR120	10537860	-	X
PP 17004 00 / 17304 00	MUR420	10590560	X	-

▼: NC FOR (PP) 17200
▯ : SPECIFIC FOR (PP)17200

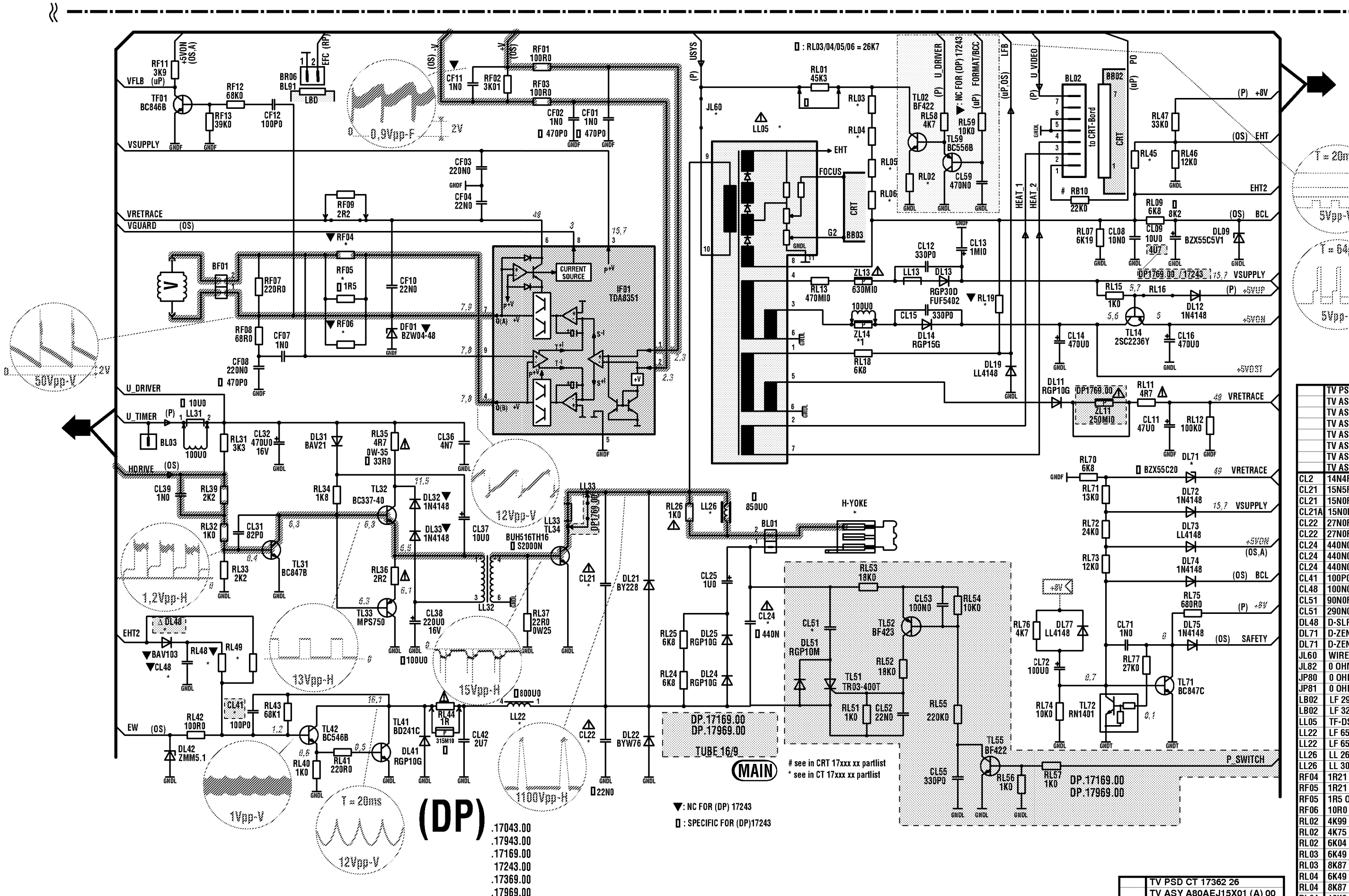
Partlist *	CT 17035	CT 17061	CT 17062	CT 17071	CT 17083	▯ DP17243
tube	21"OT	25",28"MP	33"MP	25",29"SF	24"-32"SF 16:9	21"MP
Usys	126V	132V	126V	126V	138V	126V
JL80-82	JL80	JL81	JL80	JL80	JL82	JL80
RL65	4K7	24K0	4K7	4K7	47K0	4K7

⚠ Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden

⚠ Safety Part
When repairing, use original part only

⚠ Piece de securite
N'utilisez que les pieces d'origine

SCANNING - BALAYAGE - ABLENKUNG - BARRIDO - SCANSIONE



⚠ Indicates critical safety components, and identical components should be used for replacement. Only then can the operational safety be garanteed.

Le remplacement des éléments de sécurité (repérés avec le symbole ⚠) par des composants non homologués selon la Norme CEI 65 entraine la non-conformité de l'appareil.
Dans ce cas, la responsabilité du fabricant n'est plus engagée.

Wenn Sicherheitsteile (mit dem Symbol ⚠ gekennzeichnet) durch nicht normgerechte Teile ersetzt werden, erlischt die Haftung des Herstellers.

La sostituzione degli elementi di sicurezza (contrassegnati con il segno ⚠) con componenti non omologati secondo la norma CEI 65 comporta la non conformitá dell'apparecchio.
In tal caso é “esclusa la responsabilità” del costruttore.

La subtitución de elementos de seguridad (marcados con el simbolo ⚠) por componentes no homologados segun la norma CEI 65, provoca la no conformidad del aparato.
En ese caso, el fabricante cesa de ser responsable.

	TV PSD CT 17335 26
	TV ASY A51EFS83X191 03
CL21	8N8F +3.5% -3.5% 1K6V
CL22	30N0F +5% -5% 400.0V
CL22	30N0F +5% -5% 400.0V
CL24	440N0F +5% -5% 250.0V
CL41	1N0F +10% -10% 50.0V
DL71	D-ZENER BZX55C20 20V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0% 100MI0W
LB02	LF 21U0H +5% -5%
LL05	TF-DST M30FBC3
LL22	LF 650U0H +5% -5%
LL26	LL 39U0H +10%
RF05	1R21 OHM +1% 700MI0W
RL02	6K2 OHM +5% 100MI0W
RL03	10K0 OHM +1% +100MI0W
RL04	10K0 OHM +1% +100MI0W
RL05	10K0 OHM +1% +100MI0W
RL06	3K32 OHM +1% +100MI0W
RL06	3K32 OHM +1% +100MI0W
RL19	18K0 OHM +5% 100MI0W
RL35	33R0 OHM +5% 700MI0W
RL45	110K0 OHM +5% 100MI0W
RL49	60K4 OHM +1% +100MI0W
RL65	4K7 OHM +5% 250MI0W
RV20	33K2 OHM +1% 250MI0W

	TV PSD CT 17362 26
	TV ASY A80AEJ15X01 (A) 00
CL21	16N7F +3.5% -3.5% 1K6V
CL22	0N0F +5% -5% 400.0V 00
CL22	30N0F +5% -5% 400.0V
CL24	560N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	10N0F +10% 100.0V
DL48	D-SLP BAV103 200.0V
DL71	BZX55B24 24V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0% 100MI0W
LB02	LF 32U0H +4% -4%
LB02	LF 21U0H +5% -5%
LL05	TF-DST TDS29
LL05	TF-DST M30FBC
LL22	LF 650U0H +/-5% EAST-WEST
LL26	LL 22U0H +10%
RF05	1R0 OHM +1% 700MI0W
RL02	6K2 OHM +5% 100MI0W
RL03	4K75 OHM +1% 100MI0W
RL04	4K75 OHM +1% 100MI0W
RL05	4K75 OHM +1% 100MI0W
RL06	10K0 OHM +1% 100MI0W
RL19	13K0 OHM +5% 100MI0W
RL35	4R7 OHM +5% 250MI0W
RL45	150K0 OHM +5% 100MI0W
RL48	76K8 OHM +1% 100MI0W
RL49	560K0 OHM +5% 100MI0W
RL65	4K7 OHM +5% 250MI0W
RV20	33K2 OHM +1% 250MI0W

	TV PSD CT 17083 38
	TV ASY W56EGV023X015 56 01
	TV ASY W56EGV023X015 56 01
	TV ASY W66EGV023X015 66 00
	TV ASY W66EGV023X015 66 00
	TV ASY W66EGV023X015 66 01
	TV ASY W76EGV023X015 (A) 00
	TV ASY W76EGV023X015 (A) 00
CL2	14N4F +3.5% -3.5% 1K6V
CL21	15N5F +3.5% -3.5% 1K6V
CL21	15N0F +3.5% -3.5% 2K0V
CL21A	15N0F +3.5% -3.5% 1K6V
CL22	27N0F +5% -5% 400.0V
CL22	27N0F +5% -5% 1K0V
CL24	440N0F +5% -5% 250.0V
CL24	440N0F +5% -5% 400.0V
CL24	440N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	100N0F +5% 63.0V
CL51	90N0F +5% -5% 250.0V
CL51	290N0F +5% -5% 400.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55C20 20V 500MI0W
DL71	D-ZENER BZX55C24 24V 500MI0W
JL60	WIREBARE 22
JL82	0 OHM +0%
JP80	0 OHM +0%
JP81	0 OHM +0%
LB02	LF 29U0H +4% -4%
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29
LL22	LF 650U0H +5% -5%
LL22	LF 650U0H +5% -5% EAST-WEST
LL26	LL 26U5H +10%
LL26	LL 30U5H 2519 A0
RF04	1R21 OHM +1% 700MI0W
RF05	1R21 OHM +1% 700MI0W
RF05	1R5 OHM +1% 700MI0W
RF06	10R0 OHM +1% +100PPM/'C
RL02	4K99 OHM +1% +100PPM/'C
RL02	4K75 OHM +1% +100PPM/'C
RL02	6K04 OHM +1% +100PPM/'C
RL03	6K49 OHM +1% +100PPM/'C
RL03	8K87 OHM +1% +100PPM/'C
RL04	6K49 OHM +1% +100PPM/'C
RL04	8K87 OHM +1% +100PPM/'C
RL04	10K0 OHM +1% +100PPM/'C
RL05	6K49 OHM +1% +100PPM/'C
RL05	8K87 OHM +1% +100PPM/'C
RL05	10K0 OHM +1% +100PPM/'C
RL06	6K49 OHM +1% +100PPM/'C
RL06	8K87 OHM +1% +100PPM/'C
RL06	3K32 OHM +1% +100PPM/'C
RL06	2K37 OHM +1% +100PPM/'C
RL11	4R7 OHM +10% 250MI0W
RL11	4R7 OHM +5% 250MI0W
RL19	15K0 OHM +5%
RL19	13K0 OHM +5%
RL43	68K1 OHM +1% 250MI0W
RL43	68K1 OHM +1% +100PPM/'C
RL45	470K0 OHM +5%
RL45	390K0 OHM +5%
RL46	12K0 OHM +5%
RL47	33K0 OHM +5%
RL48	1K0 OHM +5%
RL48	220K0 OHM +5%
RL48	237K0 OHM +1% +100PPM/'C
RL49	180K0 OHM +5%
RL49	143K0 OHM +1% +100PPM/'C
RL64	8K25 OHM +1% +100PPM/'C
RL65	47K0 OHM +5% 250MI0W
RV20	100K0 OHM +1% 250MI0W
RV20	33K2 OHM +1% +100PPM/'C
RV20	100K0 OHM +1% 250MI0W
ZL13	MP63 630MI0 A 65.0V

	TV PSD CT 17383 38
	TV ASY W56EGV023X015 56 01
	TV ASY W66EJU023X015 66 00
	TV ASY W76EGV023X015 (A) 00
CL21	15N0F +3.5% -3.5% 1K6V
CL22	27N0F +5% -5% 400.0V
CL24	440N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	100N0F +5% 63.0V
CL48	100N0F +5% 63.0V 85C
CL51	290N0F +5% -5% 250.0V
DL48	BAV103 200.0V
DL71	ZENER BZX55C20 20V 500MI0W
JL60	WIREBARE 22
JL82	0 OHM +0% 100MI0W
LB02	LF 32U0H +4% -4%
LB02	LF 21U0H +5% -5%
LL05	TF-DST TDS29 15393000 16
LL05	TF-DST M30FBC
LL22	LF 650U0H +5% -5%
LL26	LL 26U5H +10%
RF05	1R21 OHM +1% 700MI0W
RL02	4K75 OHM +1% +100MI0W
RL03	6K49 OHM +1% +100MI0W
RL04	6K49 OHM +1% +100MI0W
RL05	6K49 OHM +1% +100MI0W
RL06	3K32 OHM +1% +100MI0W
RL06	3K32 OHM +1% +100MI0W
RL19	22K0 OHM +5% 100MI0W
RL35	4R7 OHM +5% 250MI0W
RL45	150K0 OHM +5% 100MI0W
RL48	130K0 OHM +5% 100MI0W
RL49	220K0 OHM +5% 100MI0W
RL65	47K0 OHM +5% 250MI0W
RV20	100K0 OHM +1% 250MI0W

	TV PSD CT 17061 32
	TV ASY A66EHJ43X15 00
	TV ASY A59EHJ43X15 00
CL21	14N4F +3.5% -3.5% 1K6V
CL21	14N4F +3.5% -3.5% 1K6V
CL21	14N0F +3.5% -3.5% 1K5V
CL22	30N0F +5% -5% 400.0V
CL22	30N0F +5% -5% 400.0V
CL22	30N0F +5% -5% 1K0V
CL24	440N0F +5% -5% 400.0V
CL24	470N0F +5% -5% 250.0V
CL24	440N0F +5% -5% 250.0V
CL24	440N0F +5% -5% 250.0V
CL24A	440N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	10N0F +10% 63.0V
CL48	10N0F +10% 100.0V
DL48	BAV103 200.0V
DL71	BZX55B24 24V 500MI0W
DL71	BZX55C24 24V 500MI0W
DL71	BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL81	0 OHM +0% 100MI0W
JP80	0 OHM +0% 100MI0W
LB02	13U5H +5% -5%
LB02	18U0H +7% -7%
LB02	21U0H +5% -5%
LB02	21U0H +5% -5%
LL05	TF-DST M30FBC3 10546610 3087
LL05	TF-DST M30FBC3 10600190 3087
LL05	TF-DST M30FBC3 10608680 3087
LL22	650U0H +5% -5%
LL22	650U0H +5% -5% EAST-WEST
LL26	26U5H +10%
LL26	30U5H 2519 A0
RF04	1R21 OHM +1% 700MI0W
RF05	1R0 OHM +1% 700MI0W
RF05	1R21 OHM +1% 700MI0W
RF06	12R1 OHM +1% 100MI0W
RL02	10K0 OHM +5% 100MI0W
RL02	6K04 OHM +1% 100MI0W
RL02	499R0 OHM +1% 100MI0W
RL03	10K0 OHM +1% 100MI0W
RL03	11K5 OHM +1% 100MI0W
RL04	10K0 OHM +1% 100MI0W
RL04	20K0 OHM +1% 100MI0W
RL04	11K5 OHM +1% 100MI0W
RL05	10K0 OHM +1% 100MI0W
RL05	20K0 OHM +1% 100MI0W
RL05	11K5 OHM +1% 100MI0W
RL06	8K25 OHM +1% 100MI0W
RL06	4K75 OHM +1% 100MI0W
RL06	9K09 OHM +1% 100MI0W
RL06	11K5 OHM +1% 100MI0W
RL11	4R7 OHM +10% 250MI0W
RL11	4R7 OHM +5% 250MI0W
RL19	22K0 OHM +5% 100MI0W
RL19	33K0 OHM +5% 100MI0W
RL43	68K1 OHM +1% 250MI0W
RL43	68K1 OHM +1% 250MI0W
RL43	68K1 OHM +1% 100MI0W
RL45	180K0 OHM +5% 100MI0W
RL45	270K0 OHM +5% 100MI0W
RL46	12K0 OHM +5% 100MI0W
RL47	33K0 OHM +5% 100MI0W
RL48	76K8 OHM +1% 100MI0W
RL48	60K4 OHM +1% 100MI0W
RL64	8K25 OHM +1% 100MI0W
RL65	24K0 OHM +5% 250MI0W
RV20	33K2 OHM +1% 250MI0W
RV20	33K2 OHM +1% 100MI0W
ZL13	MP63 630MI0 A 65.0V

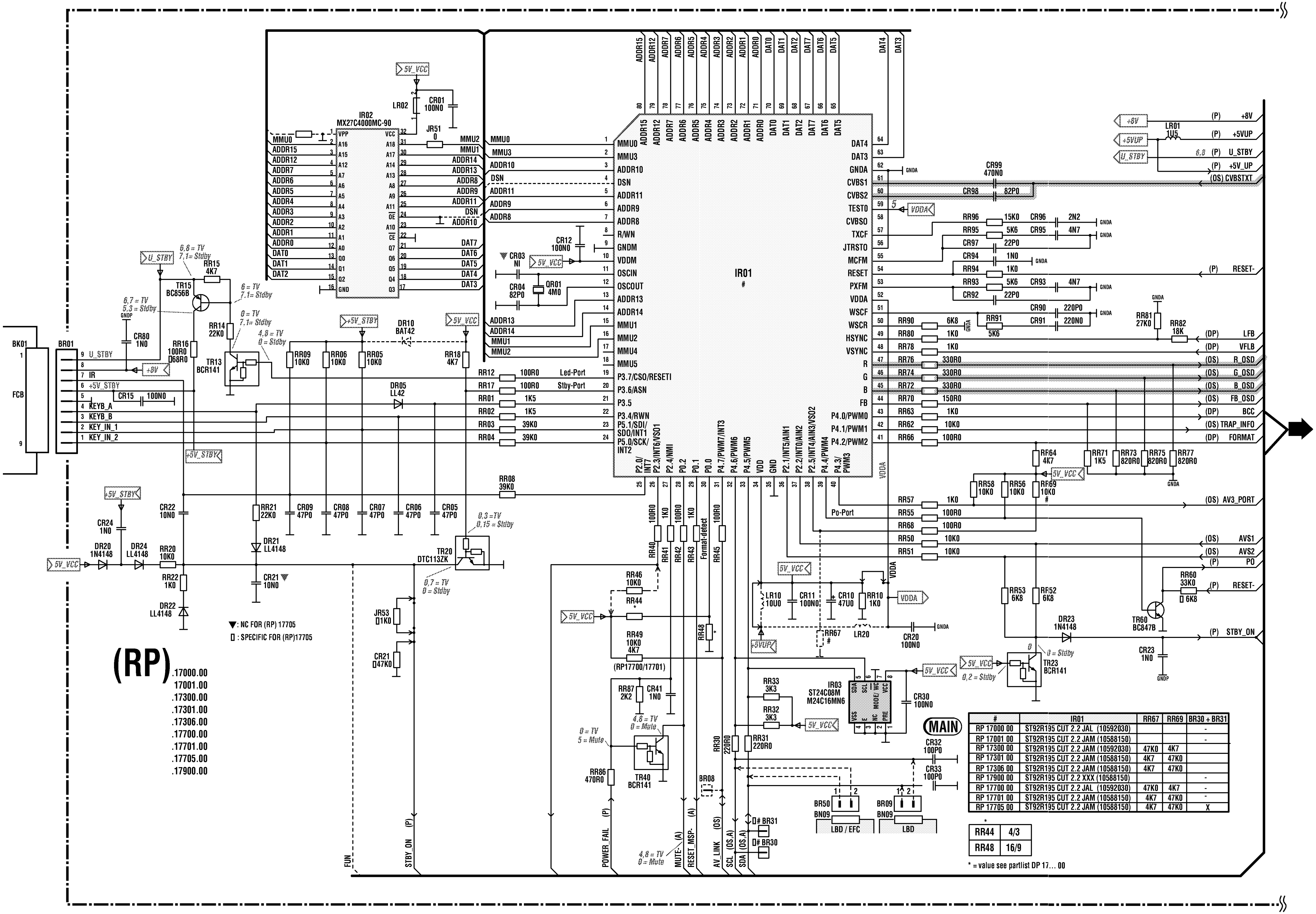
	TV PSD CT 17071 26
	TV ASY A59EGD048X30 19
	TV ASY A59EGD048X30 19
	TV ASY A68EGD038X30 (A) 68 00
	TV ASY A68EGD038X30 (A) 68 00
	TV ASY A68EJV038X30 68 00
	TV ASY A80AEJ15X01 (A) 00
CL21	16N2F +3.5% -3.5% 1K6V
CL21	16N2F +3.5% -3.5% 1K6V
CL21	16N2F +3.5% -3.5% 2K0V
CL21A	16N2F +3.5% -3.5% 1K6V
CL22	30N0F +5% -5% 400.0V
CL22	30N0F +5% -5% 400.0V
CL22	30N0F +5% -5% 1K0V
CL22	30N0F +5% -5% 400.0V
CL24	560N0F +5% -5% 250.0V
CL24	510N0F +5% -5% 250.0V
CL24	560N0F +5% -5% 250.0V
CL24	510N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	10N0F +10% 63.0V
CL48	10N0F +10% 100.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55B24 24V 500MI0W
DL71	D-ZENER BZX55C24 24V 500MI0W
DL71	D-ZENER BZX55C24 24V 500MI0W
DL71	D-ZENER BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL80	RCFCCMIN 0 OHM +0% 100MI0W
LB02	LF 29U0H +4% -4%
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29 15314470 11
LL05	TF-DST TDS29 15328730 13
LL05	TF-DST TDS29 15393020 15
LL22	LF 650U0H +5% -5%
LL22	LF 650U0H +5% -5% EAST-WEST
LL26	LL 26U5H +10%
LL26	LL 22U0H +10%
RF04	1R82 OHM +1% 700MI0W
RF05	1R0 OHM +1% 700MI0W
RF05	1R21 OHM +1% 700MI0W
RF05	1R82 OHM +1% 700MI0W
RF06	10R0 OHM +1% 100MI0W
RL02	6K8 OHM +5% 100MI0W
RL02	6K04 OHM +1% 100MI0W
RL03	4K75 OHM +1% 100MI0W
RL04	7K5 OHM +1% 100MI0W
RL04	4K75 OHM +1% 100MI0W
RL05	7K5 OHM +1% 100MI0W
RL05	4K75 OHM +1% 100MI0W
RL06	4K75 OHM +1% 100MI0W
RL11	4R7 OHM +5% 250MI0W
RL19	15K0 OHM +5% 100MI0W
RL19	18K0 OHM +5% 100MI0W
RL35	4R7 OHM +5% 250MI0W
RL43	68K1 OHM +1% 250MI0W
RL45	180K0 OHM +5% 100MI0W
RL45	470K0 OHM +5% 100MI0W
RL46	12K0 OHM +5% 100MI0W
RL47	33K0 OHM +5% 100MI0W
RL48	100K0 OHM +5% 100MI0W
RL48	100K0 OHM +1% 100MI0W
RL48	130K0 OHM +5% 100MI0W
RL49	300K0 OHM +5% 100MI0W
RL49	330K0 OHM +5% 100MI0W
RL49	1M0 OHM +5% 100MI0W
RL64	8K25 OHM +1% 100MI0W
RL65	4K7 OHM +5% 250MI0W
RV20	33K2 OHM +1% 250MI0W
ZL13	MP63 630MI0 A 65.0V
ZL13	MP80 800MI0 A 65.0V

	TV PSD CT 17361 32
	TV ASY A59EHJ43X15 00
	TV ASY A66EHJ43X15 00
CL21	14N4F +3.5% -3.5% 1K6V
CL22	30N0F +5% -5% 400.0V
CL22	30N0F +5% -5% 400.0V
CL24	440N0F +5% -5% 250.0V
CL41	100P0F +5% -5% 50.0V
CL41	100P0F +10% -10% 50.0V
CL48	0N0F +10% 100.0V
DL48	BAV103 200.0V
DL71	BZX55B24 24V 500MI0W
JL60	WIREBARE 22
JL81	0 OHM +0% 100MI0W
LB02	LF 21U0H +5% -5%
LL05	TF-DST M30FB3
LL05	TF-DST M30FBC3
LL05	TF-DST M30FBC3
LL22	LF 650U0H +5% -5%
LL26	LL 26U5H +10%
RF05	1R0 OHM +1% 700MI0W
RL02	10K0 OHM +5% 100MI0W
RL03	10K0 OHM +1% +100MI0W
RL04	10K0 OHM +1% +100MI0W
RL05	10K0 OHM +1% +100MI0W
RL06	8K25 OHM +1% +100MI0W
RL19	22K0 OHM +5% 100MI0W
RL35	4R7 OHM +5% 250MI0W
RL45	180K0 OHM +5% 100MI0W
RL48	76K8 OHM +1% +100MI0W
RL65	24K0 OHM +5% 250MI0W
RV20	33K2 OHM +1% 250MI0W

	TV PSD CT 17035 26
	TV ASY A51EFS83X191 03
CL21	8N3F +3.5% -3.5% 2K0V
CL21	8N3F +3.5% -3.5% 1K6V
CL21	8N8F +3.5% -3.5% 1K6V
CL21A	8N3F +3.5% -3.5% 1K6V
CL22	33N0F +5% -5% 400.0V
CL22	30N0F +5% -5% 400.0V
CL22	33N0F +5% -5% 1K0V
CL24	440N0F +5% -5% 400.0V
CL24	440N0F +5% -5% 250.0V
CL24	440N0F +5% -5% 250.0V
CL24A	440N0F +5% -5% 250.0V
CL41	1N0F +10% -10% 50.0V
CL48	100N0F +5% 63.0V
DL71	D-ZENER BZX55C20 20V 500MI0W
DL71	D-ZENER BZX55C24 24V 500MI0W
DL71	D-ZENER BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0%
JP81	0 OHM +0%
LB02	LF 18U0H +7% -7%
LB02	LF 21U0H +5% -5%
LL05	F-DST M30FBC3 10555640 3087
LL22	LF 650U0H +5% -5%
LL22	LF 650U0H +5% -5% EAST-WEST
LL26	LL 85U0H 2519 A0
LL26	LL 39U0H +10%
RF04	1R21 OHM +1% 700MI0W
RF05	1R21 OHM +1% 700MI0W
RF05	1R5 OHM +1% 700MI0W
RF06	10R0 OHM +1% +100PPM/'C
RL02	6K2 OHM +5%
RL02	6K04 OHM +1%
RL03	10K0 OHM +1%
RL04	10K0 OHM +1%
RL04	20K0 OHM +1%
RL05	10K0 OHM +1%
RL0	20K0 OHM +1%
RL06	10K0 OHM +1%
RL06	3K32 OHM +1%
RL11	4R7 OHM +10% 250MI0W
RL11	4R7 OHM +5% 250MI0W
RL19	18K0 OHM +5%
RL43	68K1 OHM +1% 250MI0W
RL43	68K1 OHM +1%
RL45	82K0 OHM +5%
RL45	110K0 OHM +5%
RL45	470K0 OHM +5%
RL46	12K0 OHM +5%
RL47	33K0 OHM +5%
RL48	100K0 OHM +1%
RL49	76K8 OHM +1%
RL49	60K4 OHM +1%
RL64	8K25 OHM +1%
RL65	4K7 OHM +5% 250MI0W
RV20	3K7 OHM +1% 250MI0W
RV20	33K2 OHM +1% 250MI0W
RV20	33K2 OHM +1%
ZL13	MP63 630MI0 A 65.0V

	TV PSD CT 17062 26
	TV ASY A80AEJ15X01 (A) 00
CL21	16N2F +3.5% -3.5% 1K6V
CL21	16N5F +3.5% -3.5% 2K0V
CL21	16N7F +3.5% -3.5% 1K6V
CL21A	16N5F +3.5% -3.5% 1K6V
CL22	30N0F +5% -5% 400.0V
CL22	30N0F +5% -5% 1K0V
CL22	30N0F +5% -5% 400.0V
CL24	560N0F +5% -5% 250.0V
CL24	560N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	10N0F +10% 63.0V
CL48	10N0F +10% 100.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55B24 24V 500MI0W
DL71	D-ZENER BZX55C24 24V 500MI0W
DL71	D-ZENER BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0% 100MI0W
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29 15314470 11
LL05	TF-DST TDS29 15393010 14
LL22	LF 650U0H +5% -5%
LL22	LF 650U0H +5% -5% EAST-WEST
LL26	LL 26U5H +10%
LL26	LL 22U0H +10%
RF05	1R0 OHM +1% 700MI0W
RF05	1R21 OHM +1% 700MI0W
RF06	10R0 OHM +1% 100MI0W
RL02	6K2 OHM +5% 100MI0W
RL02	6K04 OHM +1% 100MI0W
RL03	4K75 OHM +1% 100MI0W
RL04	4K75 OHM +1% 100MI0W
RL05	4K75 OHM +1% 100MI0W
RL06	6K81 OHM +1% 100MI0W
RL06	10K0 OHM +1% 100MI0W
RL19	13K0 OHM +5% 100MI0W
RL35	4R7 OHM +5% 250MI0W
RL45	150K0 OHM +5% 100MI0W
RL48	76K8 OHM +1% 100MI0W
RL48	100K0 OHM +5% 100MI0W
RL49	560K0 OHM +5% 100MI0W
RL65	4K7 OHM +5% 250MI0W
RV20	23K7 OHM +1% 250MI0W
RV20	33K2 OHM +1% 250MI0W

CONTROL MICROPROCESSOR - MICROPROCESSEUR DE COMMANDE - MIKROPROZESSOR - MICROPROCESSORE DEI COMANDI - MICROPROCESADOR DE LOS MANDOS



IR01
IR02
MX27C4000MC-90
IR03
ST24C08M
M24C16MN6
BK01
BR01
FCB
U_STBY
IR
+5V_STBY
KEYB_A
KEYB_B
KEY_IN_1
KEY_IN_2
TR15
BC856B
TR13
BCR141
TR20
DTC113ZK
TR23
BCR141
TR40
BCR141
TR60
BC847B
DR10
BAT42
DR05
LL42
DR20
1N4148
DR24
LL4148
DR21
LL4148
DR22
LL4148
DR23
1N4148
QR01
4M0
LR01
1U5
LR02
LR10
10U0
LR20
Led-Port
Stby-Port
Po-Port
Format-detect
(P) +8V
(P) +5VUP
(P) U_STBY
(P) +5V_UP
(OS) CVBSTXT
(P) RESET-
(DP) LFB
(DP) VFLB
(OS) R_OSD
(OS) G_OSD
(OS) B_OSD
(OS) FB_OSD
(DP) BCC
(OS) TRAP_INFO
(DP) FORMAT
(OS) AV3_PORT
(OS) AVS1
(OS) AVS2
(P) P0
(P) RESET-
(P) STBY_ON
FUN
STBY_ON (P)
POWER_FAIL (P)
MUTE- (A)
RESET_MSP- (A)
AV_LINK (OS)
SCL (OS,A)
SDA (OS,A)
BR08
BR30
BR31
BR50
BR09
BN09
LBD / EFC
LBD
MAIN
6,8 = TV
7,1= Stdby
0,3 = TV
0,15 = Stdby
0,7 = TV
0 = Stdby
4,8 = TV
0 = Mute
0 = TV
5 = Mute
(RP17700/17701)

▼: NC FOR (RP) 17705

▯ : SPECIFIC FOR (RP)17705

(RP).17000.00
.17001.00
.17300.00
.17301.00
.17306.00
.17700.00
.17701.00
.17705.00
.17900.00

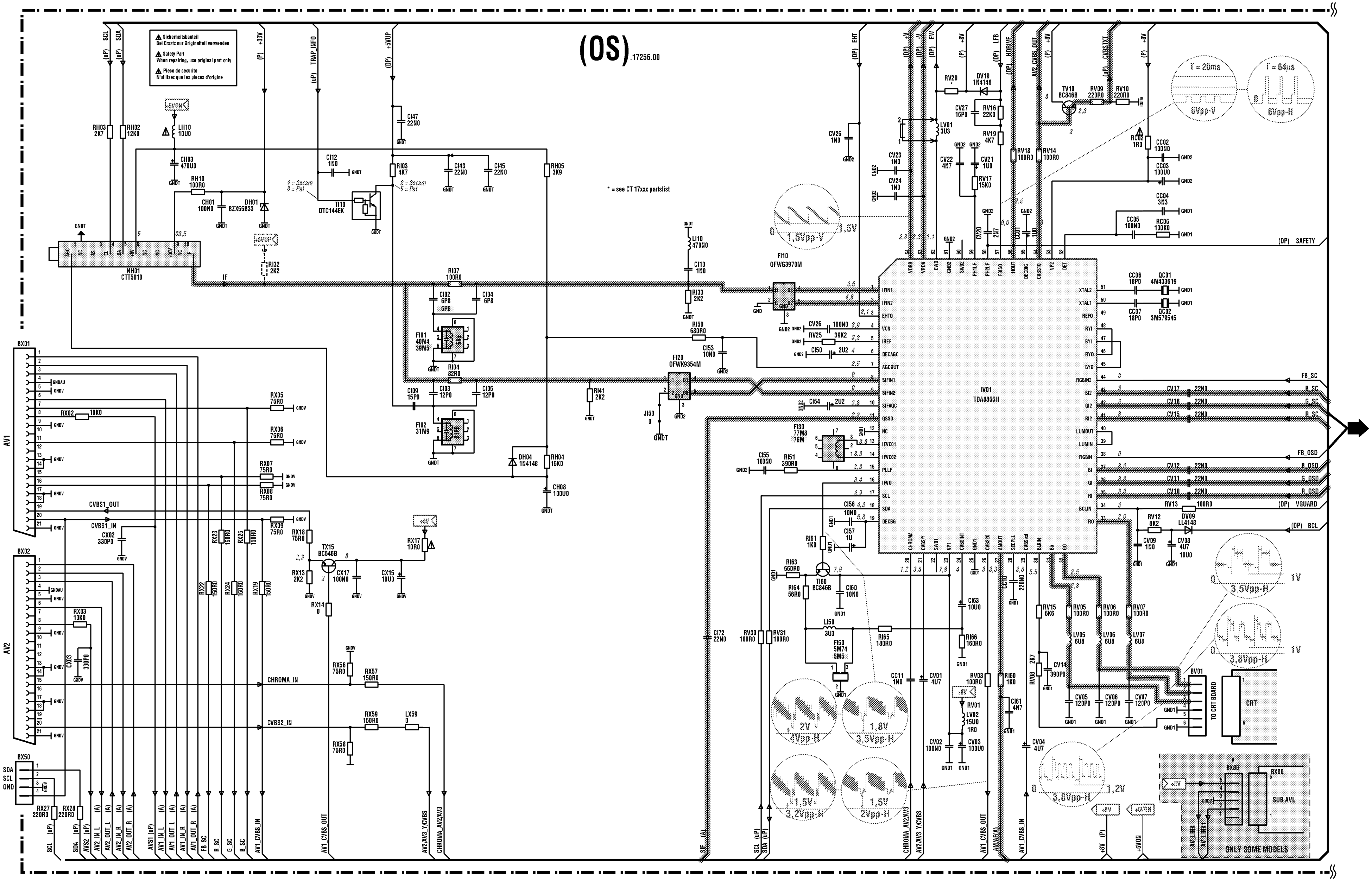
#	IR01	RR67	RR69	BR30 + BR31
RP 17000 00	ST92R195 CUT 2.2 JAL (10592030)			-
RP 17001 00	ST92R195 CUT 2.2 JAM (10588150)			-
RP 17300 00	ST92R195 CUT 2.2 JAM (10592030)	47K0	4K7	
RP 17301 00	ST92R195 CUT 2.2 JAM (10588150)	4K7	47K0	
RP 17306 00	ST92R195 CUT 2.2 JAM (10588150)	4K7	47K0	
RP 17900 00	ST92R195 CUT 2.2 XXX (10588150)			-
RP 17700 00	ST92R195 CUT 2.2 JAL (10592030)	47K0	4K7	-
RP 17701 00	ST92R195 CUT 2.2 JAM (10588150)	4K7	47K0	-
RP 17705 00	ST92R195 CUT 2.2 JAM (10588150)	4K7	47K0	X

*

RR44	4/3
RR48	16/9

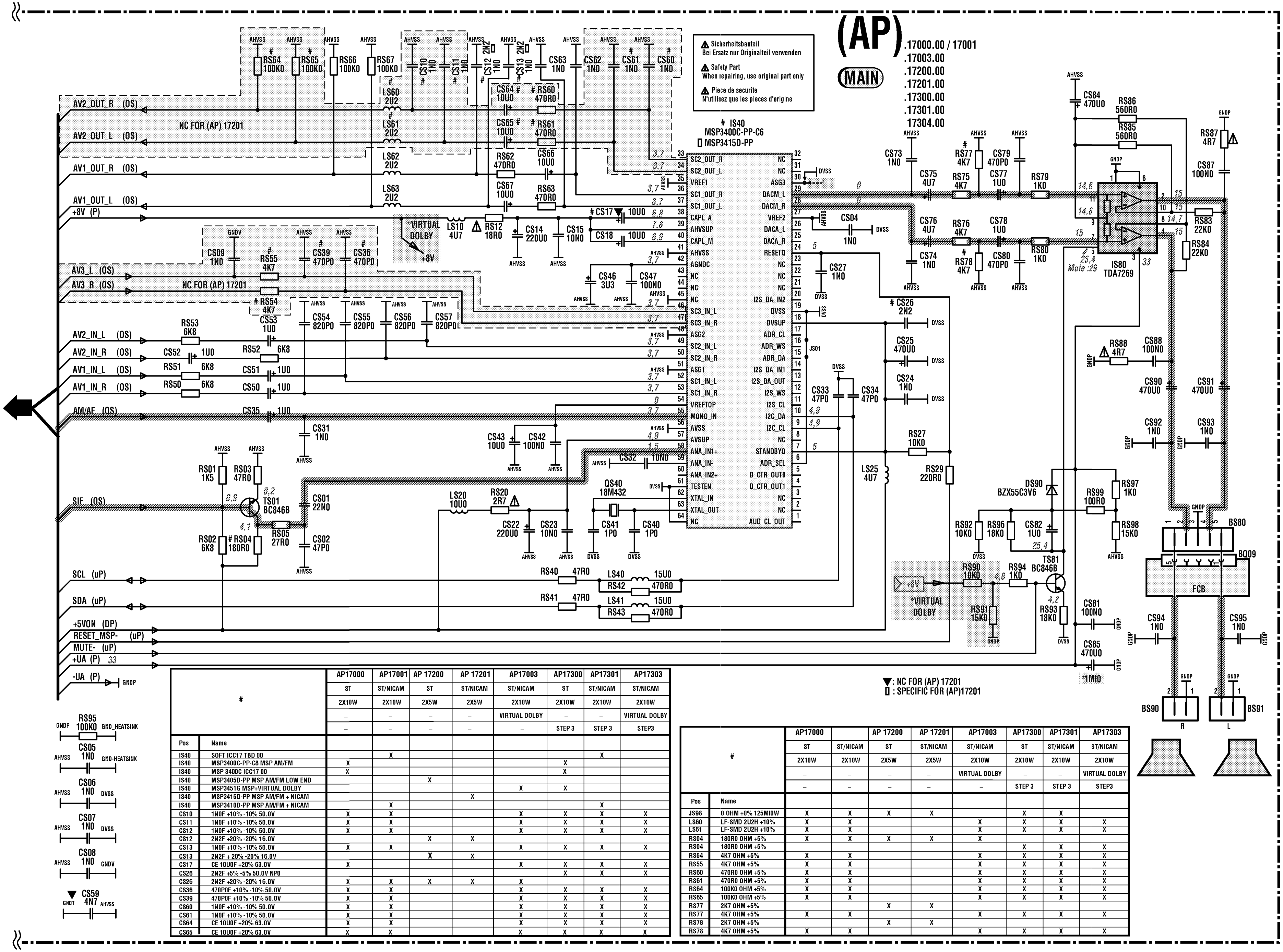
* = value see partlist DP 17… 00

RF/FI/ SCART INTERFACE/VIDEO SIGNAL PROCESSING -HF/FI INTERFACE PERITELEVISION/TRAITEMENT LUMINANCE CHROMINANCE - HF/ZF/ SCART INTERFACE/VIDEO SIGNALVERARBEITUNG - RF/FI /PRESA PERITEL/ELABORAZIONE VIDEO - RF/FI /EUROCONECTOR/TRATAMENTO VIDEO



(OS).17256.00
Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden
Safety Part
When repairing, use original part only
Piece de securite
N'utilisez que les pieces d'origine
* = see CT 17xxx partslist
NH01
CTT5010
IF
IV01
TDA8855H
FI10
QFWG3970M
FI20
OFWK9354M
FI01
40M4
39M5
FI02
31M9
FI30
77M8
76M
FI50
5M74
5M5
TI10
DTC144EK
4 = Secam
0 = Pal
TX15
BC546B
TI60
BC846B
TV10
BC846B
DH01
BZX55B33
DH04
1N4148
DV19
1N4148
DV09
LL4148
QC01
4M433619
QC02
3M579545
LV01
3U3
LH10
10U0
LI10
470N0
LI50
3U3
LV05
6U8
LV06
6U8
LV07
6U8
LV02
15U0
BX01
AV1
BX02
AV2
BX50
SDA
SCL
GND
BV01
TO CRT BOARD
CRT
BX80
SUB AVL
ONLY SOME MODELS
AV_LINK
AV_LINK1
CVBS1_OUT
CVBS1_IN
CHROMA_IN
CVBS2_IN
SCL
SDA
(uP)
(P)
+33V
TRAP_INFO
(DP)
+5VUP
+5VON
+8V
EHT
EW
LFB
HDRIVE
AV2_CVBS_OUT
CVBSTXT
SAFETY
VGUARD
BCL
FB_SC
B_SC
G_SC
R_SC
FB_OSD
B_OSD
G_OSD
R_OSD
AVS2
AV2_IN_L
AV2_OUT_L
AV2_IN_R
AV2_OUT_R
AVS1
AV1_IN_L
AV1_OUT_L
AV1_IN_R
AV1_OUT_R
FB_SC
R_SC
G_SC
B_SC
AV1_CVBS_IN
AV1_CVBS_OUT
AV2/AV3_Y,CVBS
CHROMA_AV2/AV3
SIF_(A)
CHROMA_AV2/AV3
AV2/AV3_Y,CVBS
AV1_CVBS_OUT
AM/AF(A)
AV1_CVBS_IN
+8V (P)
+5VON
T = 20ms
T = 64µs
6Vpp-V
6Vpp-H
1,5Vpp-V
1,5V
3,5Vpp-H
3,8Vpp-H
1V
4Vpp-H
2V
3,5Vpp-H
1,8V
3,2Vpp-H
1,5V
2Vpp-H
1,5V
3,8Vpp-H
1,2V
IFIN1
IFIN2
EHTO
VCS
IREF
DECAGC
AGCOUT
SIFIN1
SIFIN2
SIFAGC
QSSO
NC
IFVCO1
IFVCO2
PLLF
IFVO
SCL
SDA
DECBG
XTAL2
XTAL1
REFO
RYI
BYI
RYO
BYO
RGBIN2
BI2
GI2
RI2
LUMOUT
LUMIN
RGBIN
BI
GI
RI
BCLIN
RO
GO
BO
BLKIN
HOUT
FBISO
PH1LF
PH2LF
SWO2
GND2
EWD
VDRA
VDRB
VP2
DET
CHROMA
CVBS/Y
SWO1
VP1
CVBSINT
GND1
CVBS2O
AMOUT
SECPLL
CVBSext
DECDIG
CVBS1O
RH03 2K7
RH02 12K0
RH10 100R0
CH03 470U0
CH01 100N0
CH08 100U0
RH05 3K9
RH04 15K0
RI03 4K7
CI12 1N0
CI47 22N0
CI43 22N0
CI45 22N0
RI32 2K2
RI07 100R0
CI02 6P8 5P6
CI04 6P8
RI04 82R0
CI09 15P0
CI03 12P0
CI05 12P0
RI41 2K2
RI33 2K2
CI10 1N0
RI50 680R0
CI53 10N0
JI50 0
CI72 22N0
CV25 1N0
CV23 1N0
CV24 1N0
CV26 100N0
RV25 39K2
CI50 2U2
CI54 2U2
CI55 100N0
RI51 390R0
CI56 10N0
CI57 1U
RI61 1K0
RI63 560R0
RI64 56R0
CI60 10N0
CI63 10U0
RI65 180R0
RI66 160R0
RV30 100R0
RV31 100R0
CC11 1N0
CV01 4U7
RV03 100R0
RI60 1K0
CI61 4N7
CV02 100N0
CV03 100U0
CV04 4U7
CC10 220N0
RV01
1R0
RV20
CV27 15P0
RV16 22K0
RV19 4K7
RV18 100R0
RV14 100R0
CV22 4N7
CV21 1U0
RV17 15K0
CV20 2N7
CC01 1U0
RV09 220R0
RV10 220R0
RC02 1R0
CC02 100N0
CC03 100U0
CC04 3N3
CC05 100N0
RC05 100K0
CC06 18P0
CC07 18P0
CV17 22N0
CV16 22N0
CV15 22N0
CV12 22N0
CV11 22N0
CV10 22N0
RV13 100R0
RV12 8K2
CV09 1N0
CV08 4U7 10U0
RV15 5K6
RV05 100R0
RV06 100R0
RV07 100R0
RV08 2K7
CV14 390P0
CV05 120P0
CV06 120P0
CV07 120P0
RX05 75R0
RX06 75R0
RX02 10K0
RX07 75R0
RX08 75R0
RX09 75R0
CX02 330P0
RX03 10K0
CX03 330P0
RX22 150R0
RX23 150R0
RX24 150R0
RX25 150R0
RX19 150R0
RX18 75R0
RX13 2K2
RX14 0
CX17 100N0
CX15 10U0
RX17 10R0
RX56 75R0
RX57 150R0
RX59 150R0
LX59 0
RX58 75R0
RX27 220R0
RX28 220R0
GNDT
GND1
GND2
GNDV
GNDAU

AMPLIFIER SCHEMATIC DIAGRAM - SCHEMA DE L'AMPLIFICATEUR - SCHALTBILD AUDIO-SIGNALVERABEITUNG - SCHEMA DELL' AMPLIFICATORE
ESQUEMA DEL AMPLIFICADOR
(STEREO)


(AP)
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.17003.00
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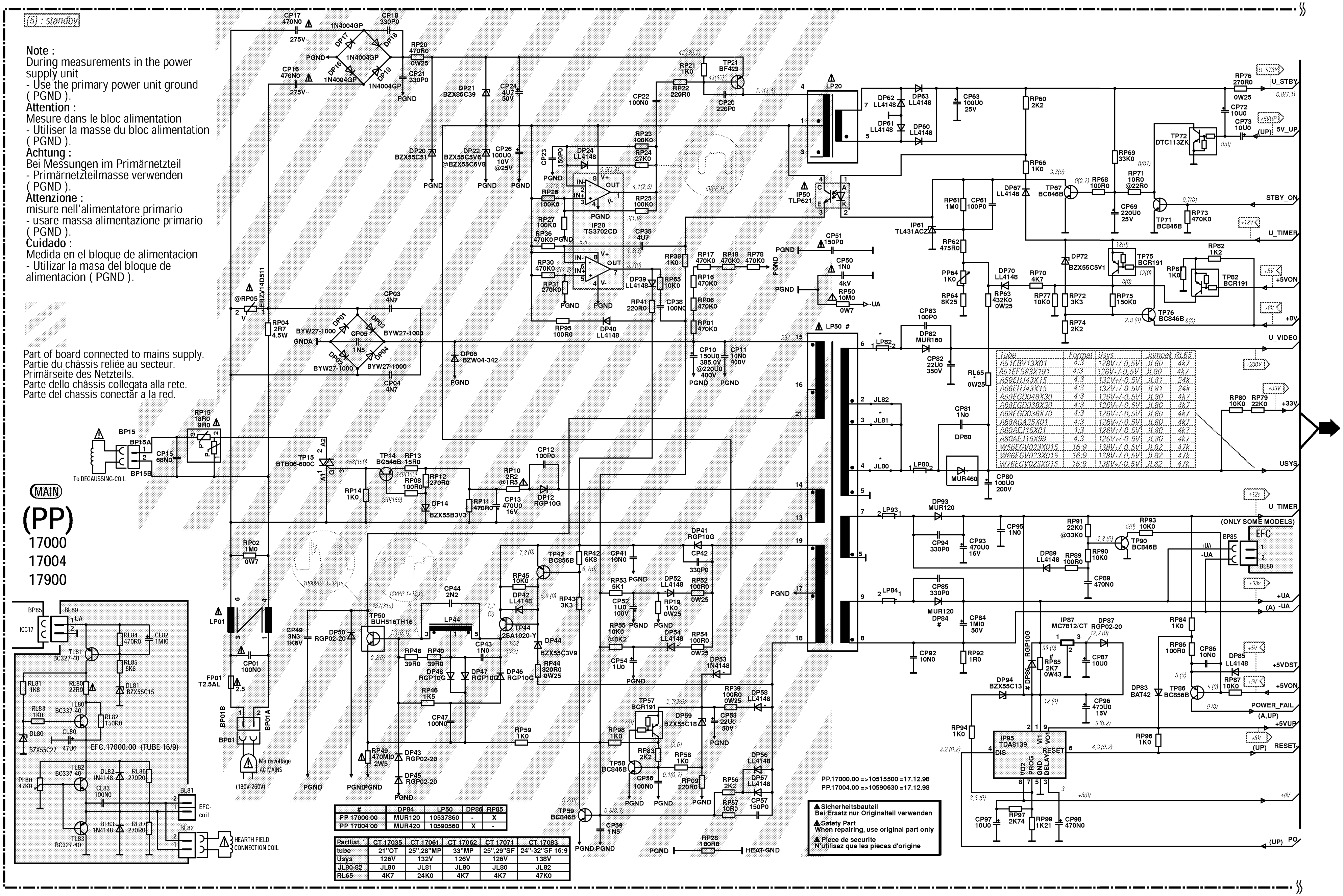
.17300.00
.17301.00
17304.00
MAIN
⚠ Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden
⚠ Safety Part
When repairing, use original part only
⚠ Piece de securite
N'utilisez que les pieces d'origine
# IS40
MSP3400C-PP-C6
▯ MSP3415D-PP
IS80
TDA7269
AV2_OUT_R (OS)
AV2_OUT_L (OS)
AV1_OUT_R (OS)
AV1_OUT_L (OS)
+8V (P)
AV3_L (OS)
AV3_R (OS)
AV2_IN_L (OS)
AV2_IN_R (OS)
AV1_IN_L (OS)
AV1_IN_R (OS)
AM/AF (OS)
SIF (OS)
SCL (uP)
SDA (uP)
+5VON (DP)
RESET_MSP- (uP)
MUTE- (uP)
+UA (P) 33
-UA (P)
NC FOR (AP) 17201
°VIRTUAL DOLBY
+8V
SC2_OUT_R
SC2_OUT_L
VREF1
SC1_OUT_R
SC1_OUT_L
CAPL_A
AHVSUP
CAPL_M
AHVSS
AGNDC
SC3_IN_L
SC3_IN_R
ASG2
SC2_IN_L
SC2_IN_R
ASG1
SC1_IN_L
SC1_IN_R
VREFTOP
MONO_IN
AVSS
AVSUP
ANA_IN1+
ANA_IN-
ANA_IN2+
TESTEN
XTAL_IN
XTAL_OUT
ASG3
DACM_L
DACM_R
VREF2
DACA_L
DACA_R
RESETQ
I2S_DA_IN2
DVSS
DVSUP
ADR_CL
ADR_WS
ADR_DA
I2S_DA_IN1
I2S_DA_OUT
I2S_WS
I2S_CL
I2C_DA
I2C_CL
STANDBYQ
ADR_SEL
D_CTR_OUT0
D_CTR_OUT1
AUD_CL_OUT
NC
RS64 100K0
RS65 100K0
RS66 100K0
RS67 100K0
CS10 1N0
CS11 1N0
CS12 2N2 1N0
CS13 2N2 1N0
CS63 1N0
CS62 1N0
CS61 1N0
CS60 1N0
LS60 2U2
LS61 2U2
LS62 2U2
LS63 2U2
CS64 10U0
RS60 470R0
CS65 10U0
RS61 470R0
RS62 470R0
CS66 10U0
CS67 10U0
RS63 470R0
LS10 4U7
RS12 18R0
CS17 10U0
CS18 10U0
CS14 220U0
CS15 10N0
CS09 1N0
RS55 4K7
CS39 470P0
CS36 470P0
RS54 4K7
CS46 3U3
CS47 100N0
CS54 820P0
CS55 820P0
CS56 820P0
CS57 820P0
RS53 6K8
CS53 1U0
CS52 1U0
RS52 6K8
RS51 6K8
CS51 1U0
RS50 6K8
CS50 1U0
CS35 1U0
CS31 1N0
CS43 10U0
CS42 100N0
CS32 10N0
RS01 1K5
RS03 47R0
TS01 BC846B
RS02 6K8
RS04 180R0
RS05 27R0
CS01 22N0
CS02 47P0
LS20 10U0
RS20 2R7
CS22 220U0
CS23 10N0
QS40 18M432
CS41 1P0
CS40 1P0
RS40 47R0
LS40 15U0
RS42 470R0
RS41 47R0
LS41 15U0
RS43 470R0
CS04 1N0
CS27 1N0
CS26 2N2
CS25 470U0
CS24 1N0
CS33 47P0
CS34 47P0
RS27 10K0
RS29 220R0
LS25 4U7
JS01
CS73 1N0
CS75 4U7
RS75 4K7
RS77 4K7
CS79 470P0
CS77 1U0
RS79 1K0
CS76 4U7
RS76 4K7
CS78 1U0
CS74 1N0
RS78 4K7
CS80 470P0
RS80 1K0
Mute :29
CS84 470U0
RS86 560R0
RS85 560R0
RS87 4R7
CS87 100N0
RS83 22K0
RS84 22K0
RS88 4R7
CS88 100N0
CS90 470U0
CS91 470U0
CS92 1N0
CS93 1N0
DS90 BZX55C3V6
RS97 1K0
RS99 100R0
RS98 15K0
RS92 10K0
RS96 18K0
CS82 1U0
TS81 BC846B
RS90 10K0
RS94 1K0
RS91 15K0
RS93 18K0
CS81 100N0
CS85 470U0
°1MIO
CS94 1N0
CS95 1N0
BS80
BQ09
FCB
BS90
BS91
R
L
AHVSS
DVSS
GNDP
GNDV
GNDT
RS95 100K0 GND_HEATSINK
CS05 1N0 GND-HEATSINK
CS06 1N0 DVSS
CS07 1N0 DVSS
CS08 1N0 GNDV
CS59 4N7 AHVSS
▼: NC FOR (AP) 17201
▯ : SPECIFIC FOR (AP)17201

#		AP17000	AP17001	AP 17200	AP 17201	AP17003	AP17300	AP17301	AP17303
		ST	ST/NICAM	ST	ST/NICAM	ST/NICAM	ST	ST/NICAM	ST/NICAM
		2X10W	2X10W	2X5W	2X5W	2X10W	2X10W	2X10W	2X10W
		–	–	–	–	VIRTUAL DOLBY	–	–	VIRTUAL DOLBY
		–	–	–	–	–	STEP 3	STEP 3	STEP3
Pos	Name								
IS40	SOFT ICC17 TBD 00		X					X	
IS40	MSP3400C-PP-C8 MSP AM/FM	X					X		
IS40	MSP 3400C ICC17 00	X					X		
IS40	MSP3405D-PP MSP AM/FM LOW END			X					
IS40	MSP3451G MSP+VIRTUAL DOLBY					X	X		
IS40	MSP3415D-PP MSP AM/FM + NICAM				X				
IS40	MSP3410D-PP MSP AM/FM + NICAM		X					X	
CS10	1N0F +10% -10% 50.0V	X	X			X	X	X	X
CS11	1N0F +10% -10% 50.0V	X	X			X	X	X	X
CS12	1N0F +10% -10% 50.0V	X	X			X	X	X	X
CS12	2N2F +20% -20% 16.0V			X	X				
CS13	1N0F +10% -10% 50.0V	X	X			X	X	X	X
CS13	2N2F + 20% -20% 16.0V			X	X				
CS17	CE 10U0F +20% 63.0V	X				X	X	X	X
CS26	2N2F +5% -5% 50.0V NP0						X	X	X
CS26	2N2F +20% -20% 16.0V	X	X	X	X	X			
CS36	470P0F +10% -10% 50.0V	X	X			X	X	X	X
CS39	470P0F +10% -10% 50.0V	X	X			X	X	X	X
CS60	1N0F +10% -10% 50.0V	X	X			X	X	X	X
CS61	1N0F +10% -10% 50.0V	X	X			X	X	X	X
CS64	CE 10U0F +20% 63.0V	X	X			X	X	X	X
CS65	CE 10U0F +20% 63.0V	X	X			X	X	X	X

#		AP17000		AP 17200	AP 17201	AP17003	AP17300	AP17301	AP17303
		ST	ST/NICAM	ST	ST/NICAM	ST/NICAM	ST	ST/NICAM	ST/NICAM
		2X10W	2X10W	2X5W	2X5W	2X10W	2X10W	2X10W	2X10W
		–	–	–	–	VIRTUAL DOLBY	–	–	VIRTUAL DOLBY
		–	–	–	–	–	STEP 3	STEP 3	STEP3
Pos	Name								
JS98	0 OHM +0% 125MI0W	X	X	X	X		X	X	
LS60	LF-SMD 2U2H +10%	X	X			X	X	X	X
LS61	LF-SMD 2U2H +10%	X	X			X	X	X	X
RS04	180R0 OHM +5%	X	X	X	X	X			
RS04	180R0 OHM +5%						X	X	X
RS54	4K7 OHM +5%	X	X			X	X	X	X
RS55	4K7 OHM +5%	X	X			X	X	X	X
RS60	470R0 OHM +5%	X	X			X	X	X	X
RS61	470R0 OHM +5%	X	X			X	X	X	X
RS64	100K0 OHM +5%	X	X			X	X	X	X
RS65	100K0 OHM +5%	X	X			X	X	X	X
RS77	2K7 OHM +5%			X	X				
RS77	4K7 OHM +5%	X	X			X	X	X	X
RS78	2K7 OHM +5%			X	X				
RS78	4K7 OHM +5%	X	X			X	X	X	X

POWER SUPPLY - ALIMENTATION - NETZTEIL - ALIMENTAZIONE - ALIMENTACIÓN


(5) : standby
MAIN
(PP)
17000
17004
17900
CP17 470N0 275V~
CP18 330P0
CP16 470N0 275V~
1N4004GP
DP17
DP18
DP16
DP19
CP21 330P0
RP20 470R0 0W25
PGND
DP21 BZX85C39
CP24 4U7 50V
DP20 BZX55C51
DP22 BZX55C5V6 @BZX55C6V8
CP26 100U0 10V @25V
CP22 100N0
RP21 1K0
RP22 220R0
TP21 BF423
CP20 220P0
CP23 150P0
DP24 LL4148
RP23 100K0
RP24 27K0
RP26 100K0
RP25 100K0
RP27 100K0
RP36 470K0
IP20 TS3702CD
CP35 4U7
RP30 470K0
RP31 270K0
DP39 LL4148
RP65 10K0
RP41 220R0
CP38 100N0
RP38 1K0
RP17 470K0
RP18 470K0
RP78 470K0
RP16 470K0
RP06 470K0
RP01 470K0
RP95 100R0
DP40 LL4148
5VPP-H
LP20
DP62 LL4148
DP63 LL4148
DP61 LL4148
DP60 LL4148
CP63 100U0 25V
RP60 2K2
RP66 1K0
IP50 TLP621
CP51 150P0
CP50 1N0 4kV
RP50 10M0 0W7
-UA
RP61 1M0
CP61 100P0
IP61 TL431ACZ
RP62 475R0
PP64 1K0
RP64 8K25
DP67 LL4148
TP67 BC846B
RP68 100R0
CP69 220U0 25V
RP69 33K0
RP71 10R0 @22R0
TP71 BC846B
RP73 470K0
TP72 DTC113ZK
RP76 270R0 0W25
CP72 10U0
CP73 10U0
U_STBY
5V_UP
STBY_ON
U_TIMER
DP72 BZX55C5V1
TP75 BCR191
RP81 1K0
RP82 1K2
TP82 BCR191
+5VON
DP70 LL4148
RP70 4K7
RP63 432K0 0W25
RP77 10K0
RP72 3K3
RP75 150K0
TP76 BC846B
RP74 2K2
+8V
U_VIDEO
@RP05 ERZV14D511
RP04 2R7 4.5W
CP03 4N7
DP01 DP02 DP03 DP04 BYW27-1000
CP05 1N5
GNDA
CP04 4N7
DP06 BZW04-342
CP10 150U0 385.0V @220U0 400V
CP11 10N0 400V
LP50 #
CP83 100P0
DP82 MUR160
LP82
CP82 22U0 350V
RL65 * 0W25
JL82
JL81
JL80
CP81 1N0
DP80
LP80
MUR460
CP80 100U0 200V
RP80 10K0
RP79 22K0
+33V
USYS
BP15
BP15A
BP15B
CP15 68N0
To DEGAUSSING-COIL
RP15 18R0 9R0
TP15 BTB06-600C
TP14 BC546B
RP13 15R0
RP12 270R0
RP08 100R0
RP14 1K0
DP14 BZX55B3V3
RP11 470R0
CP12 100P0
RP10 2R2 @1R5
CP13 470U0 16V
DP12 RGP10G
LP93
DP93 MUR120
CP95 1N0
CP94 330P0
CP93 470U0 16V
RP91 22K0 @33K0
RP93 10K0
TP90 BC846B
DP89 LL4148
RP89 100R0
RP90 10K0
CP89 470N0
(ONLY SOME MODELS)
BP85
EFC
BL80
+UA
-UA
LP84
CP85 330P0
MUR120 DP84 #
CP84 1MI0 50V
CP92 10N0
RP92 1R0
RP02 1M0 0W7
LP01
CP01 100N0
FP01 T2.5AL
BP01B
BP01A
BP01
Mainsvoltage AC MAINS (180V-260V)
CP49 3N3 1K6V
DP50 RGP02-20
TP50 BUH516TH16
CP44 2N2
LP44
TP44 2SA1020-Y
RP48 39R0
RP40 39R0
DP48 RGP10G
DP47 RGP10G
DP46 RGP10G
CP43 1N0
DP44 BZX55C3V9
RP44 820R0 0W25
RP46 1K5
CP47 100N0
RP49 470MI0 2W5
DP43 RGP02-20
DP45 RGP02-20
TP42 BC856B
RP42 6K8
RP45 10K0
DP42 LL4148
RP43 3K3
CP41 10N0
DP41 RGP10G
CP42 330P0
RP53 5K1
DP52 LL4148
RP52 100R0 0W25
CP52 1U0 100V
RP19 1K0 0W25
RP55 10K0 @8K2
DP54 LL4148
RP54 100R0 0W25
CP54 1U0
DP53 1N4148
RP59 1K0
TP57 BCR191
RP98 1K0
DP59 BZX55C18
CP58 22U0 50V
RP39 100R0 0W25
DP58 LL4148
RP83 2K2
RP58 1K0
TP58 BC846B
CP56 100N0
RP09 220R0
RP56 2K2
DP56 LL4148
DP57 LL4148
RP57 10R0
CP57 150P0
TP59 BC846B
CP59 1N5
RP28 100R0
HEAT-GND
IP87 MC7812/CT
DP87 RGP02-20
RP85 2K7 0W43
CP87 10U0
DP86 RGP10G
DP94 BZX55C13
DP83 BAT42
CP96 470U0 16V
RP84 1K0
RP86 100R0
CP86 10N0
DP85 LL4148
TP86 BC856B
RP87 10K0
+5VDST
POWER_FAIL
(A,UP)
+5VUP
RP94 1K0
IP95 TDA8139
RESET
RP96 1K0
CP97 10U0
RP97 2K74
RP99 1K21
CP98 470N0
PO
BP85
BL80
ICC17
RL84 470R0
CL82 1MI0
TL81 BC327-40
RL85 5K6
DL81 BZX55C15
RL81 1K8
RL80 22R0
TL80 BC337-40
RL82 150R0
RL83 1K0
DL80 BZX55C27
CL80 47U0
EFC.17000.00 (TUBE 16/9)
PL80 47K0
TL82 BC337-40
DL82 1N4148
RL86 270R0
CL83 100N0
BL81
EFC-coil
TL83 BC327-40
DL83 1N4148
RL87 270R0
BL82
HEARTH FIELD CONNECTION COIL

Note :
During measurements in the power supply unit
- Use the primary power unit ground (PGND).

Attention :
Mesure dans le bloc alimentation
- Utiliser la masse du bloc alimentation (PGND).

Achtung :
Bei Messungen im Primärnetzteil
- Primärnetzteilmasse verwenden (PGND).

Attenzione :
misure nell'alimentatore primario
- usare massa alimentazione primario (PGND).

Cuidado :
Medida en el bloque de alimentacion
- Utilizar la masa del bloque de alimentacion (PGND).

Part of board connected to mains supply.
Partie du châssis reliée au secteur.
Primärseite des Netzteils.
Parte dello châssis collegata alla rete.
Parte del chassis conectar a la red.

Tube	Format	Usys	Jumper	RL65
A51EBV13X01	4:3	128V+/-0,5V	JL80	4k7
A51EFS83X191	4:3	126V+/-0,5V	JL80	4k7
A59EHJ43X15	4:3	132V+/-0,5V	JL81	24k
A66EHJ43X15	4:3	132V+/-0,5V	JL81	24k
A59EGD048X30	4:3	126V+/-0,5V	JL80	4k7
A68EGD038X30	4:3	126V+/-0,5V	JL80	4k7
A68EGD038X70	4:3	126V+/-0,5V	JL80	4k7
A68AGA25X01	4:3	126V+/-0,5V	JL80	4k7
A80AEJ15X01	4:3	126V+/-0,5V	JL80	4k7
A80AEJ15X99	4:3	126V+/-0,5V	JL80	4k7
W56EGV023X015	16:9	138V+/-0,5V	JL82	47k
W66EGV023X015	16:9	138V+/-0,5V	JL82	47k
W76EGV023X015	16:9	138V+/-0,5V	JL82	47k

PP.17000.00 =>10515500 =17.12.98
PP.17004.00 =>10590630 =17.12.98

⚠ Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden

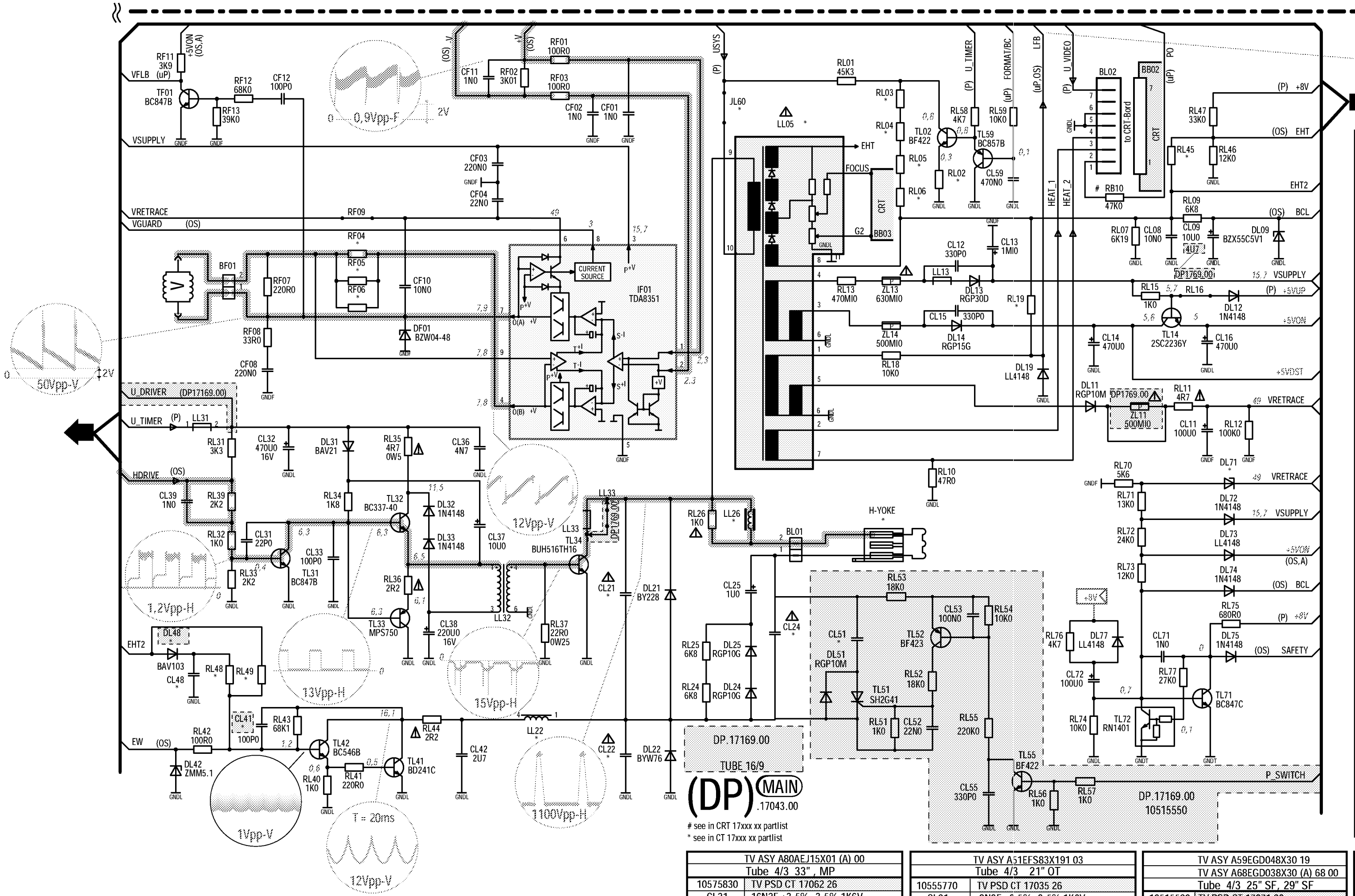
⚠ Safety Part
When repairing, use original part only

⚠ Piece de securite
N'utilisez que les pieces d'origine

#	DP84	LP50	DP86	RP85
PP 17000 00	MUR120	10537860	-	X
PP 17004 00	MUR420	10590560	X	-

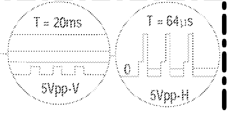
Partlist *	CT 17035	CT 17061	CT 17062	CT 17071	CT 17083
tube	21"OT	25",28"MP	33"MP	25",29"SF	24"-32"SF 16:9
Usys	126V	132V	126V	126V	138V
JL80-82	JL80	JL81	JL80	JL80	JL82
RL65	4K7	24K0	4K7	4K7	47K0

SCANNING - BALAYAGE - ABLENKUNG - BARRIDO - SCANSIONE


VFLB (uP)
VSUPPLY
VRETRACE
VGUARD (OS)
U_DRIVER (DP17169.00)
U_TIMER (P)
HDRIVE (OS)
EHT2
EW (OS)
TF01 BC847B
RF11 3K9
RF12 68K0
RF13 39K0
CF12 100P0
0,9Vpp-F
2V
CF11 1N0
RF02 3K01
RF01 100R0
RF03 100R0
CF02 1N0
CF01 1N0
CF03 220N0
CF04 22N0
RF09
RF04
RF05
RF06
RF07 220R0
RF08 33R0
CF08 220N0
CF10 10N0
DF01 BZW04-48
BF01
IF01 TDA8351
CURRENT SOURCE
50Vpp-V
LL31
RL31 3K3
CL32 470U0 16V
DL31 BAV21
RL35 4R7 0W5
CL36 4N7
CL39 1N0
RL39 2K2
RL32 1K0
CL31 22P0
RL33 2K2
TL31 BC847B
CL33 100P0
RL34 1K8
TL32 BC337-40
DL32 1N4148
DL33 1N4148
CL37 10U0
RL36 2R2
TL33 MPS750
CL38 220U0 16V
LL32
RL37 22R0 0W25
TL34 BUH516TH16
LL33
DP17169.00
12Vpp-V
1,2Vpp-H
13Vpp-H
15Vpp-H
DL48
BAV103
CL48
RL48
RL49
CL41
RL42 100R0
DL42 ZMM5.1
RL43 68K1
TL42 BC546B
RL40 1K0
RL41 220R0
TL41 BD241C
RL44 2R2
CL42 2U7
LL22
CL22
CL21
DL21 BY228
DL22 BYW76
1Vpp-V
T = 20ms
12Vpp-V
1100Vpp-H
USYS
JL60
LL05
EHT
FOCUS
CRT
G2
BB03
RL01 45K3
RL03
RL04
RL05
RL06
TL02 BF422
RL02
RL58 4K7
RL59 10K0
TL59 BC857B
CL59 470N0
P_TIMER
FORMAT/BC
LFB
U_VIDEO
BL02
BB02
to CRT-Bord
CRT
HEAT_1
HEAT_2
RB10 47K0
RL47 33K0
RL45
RL46 12K0
(P) +8V
(OS) EHT
EHT2
(OS) BCL
RL09 6K8
RL07 6K19
CL08 10N0
CL09 10U0
DL09 BZX55C5V1
CL12 330P0
CL13 1M0
LL13
RL13 470M0
ZL13 630MI0
DL13 RGP30D
RL19
CL15 330P0
ZL14 500MI0
DL14 RGP15G
RL18 10K0
DL19 LL4148
RL15 1K0
RL16
DL12 1N4148
TL14 2SC2236Y
CL14 470U0
CL16 470U0
VSUPPLY
(P) +5VUP
+5VON
+5VDST
DL11 RGP10M
ZL11 500MI0
RL11 4R7
CL11 100U0
RL12 100K0
VRETRACE
RL10 47R0
H-YOKE
RL26 1K0
LL26
BL01
CL25 1U0
CL24
RL25 6K8
DL25 RGP10G
RL24 6K8
DL24 RGP10G
DL51 RGP10M
CL51
RL53 18K0
CL53 100N0
RL54 10K0
TL52 BF423
RL52 18K0
TL51 SH2G41
RL51 1K0
CL52 22N0
RL55 220K0
TL55 BF422
CL55 330P0
RL56 1K0
RL57 1K0
DP.17169.00 10515550
DP.17169.00 TUBE 16/9
RL70 5K6
RL71 13K0
RL72 24K0
RL73 12K0
DL71
DL72 1N4148
DL73 LL4148
DL74 1N4148
RL75 680R0
DL75 1N4148
RL76 4K7
DL77 LL4148
CL72 100U0
CL71 1N0
RL77 27K0
TL71 BC847C
RL74 10K0
TL72 RN1401
(OS,A)
(OS) SAFETY
P_SWITCH

(DP) MAIN .17043.00

see in CRT 17xxx xx partlist
* see in CT 17xxx xx partlist



	TV ASY A59EHJ43X15 00 TV ASY A66EHJ43X15 00 Tube 4/3 25", 28" , MP /Vectorgun
10518330	TV PSD CT 17061 32
CL21	14N0F +3.5% -3.5% 1K5V
CL22	30N0F +5% -5% 400.0V
CL24	470N0F +5% -5% 250.0V
CL24	440N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	CPM 10N0F +10% 63.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL81	0 OHM +0% 100MI0W
JP80	0 OHM +0% 100MI0W
LB02	LF 18U0H +7% -7%
LL05	TF-DST M30FBC3 10546610 3087 A0
LL22	LF 650U0H +5% -5% R 2873 A0 00
LL26	LL 26U5H +10%
LL26	LL 30U5H 2519 A0
RF04	1R21 OHM +1% 700MI0W
RF05	1R0 OHM +1% 700MI0W
RF05	1R21 OHM +1% 700MI0W
RF06	12R1 OHM +1% 100MI0W
RL02	10K0 OHM +5% 100MI0W
RL02	6K04 OHM +1% 100MI0W
RL02	499R0 OHM +1% 100MI0W
RL03	10K0 OHM +1% 100MI0W
RL03	11K5 OHM +1% 100MI0W
RL04	10K0 OHM +1% 100MI0W
RL04	20K0 OHM +1% 100MI0W
RL04	11K5 OHM +1% 100MI0W
RL05	10K0 OHM +1% 100MI0W
RL05	20K0 OHM +1% 100MI0W
RL05	11K5 OHM +1% 100MI0W
RL06	4K75 OHM +1% 100MI0W
RL06	11K5 OHM +1% 100MI0W
RL11	4R7 OHM +10% 250MI0W
RL11	4R7 OHM +5% 250MI0W
RL19	22K0 OHM +5% 100MI0W
RL19	33K0 OHM +5% 100MI0W
RL43	68K1 OHM +1% 250MI0W
RL43	68K1 OHM +1% 250MI0W
RL43	68K1 OHM +1% 100MI0W
RL45	180K0 OHM +5% 100MI0W
RL45	270K0 OHM +5% 100MI0W
RL46	12K0 OHM +5% 100MI0W
RL47	33K0 OHM +5% 100MI0W
RL48	76K8 OHM +1% 100MI0W
RL48	60K4 OHM +1% 100MI0W
RL64	8K25 OHM +1% 100MI0W
RL65	RCF 24K0 OHM +5% 250MI0W
RV20	RMF 33K2 OHM +1% 250MI0W
RV20	33K2 OHM +1% 100MI0W
ZL13	PROTEC MOD MP63 630MI0 A 65.0V

⚠ Indicates critical safety components, and identical components should be used for replacement. Only then can the operational safety be garanteed.

Le remplacement des éléments de sécurité (repérés avec le symbole ⚠) par des composants non homologués selon la Norme CEI 65 entraine la non-conformité de l'appareil.
Dans ce cas, la responsabilité du fabricant n'est plus engagée.

Wenn Sicherheitsteile (mit dem Symbol ⚠ gekennzeichnet) durch nicht normgerechte Teile ersetzt werden, erlischt die Haftung des Herstellers.

La sostituzione degli elementi di sicurezza (contrassegnati con il segno ⚠) con componenti non omologati secondo la norma CEI 65 comporta la non conformitá dell'apparecchio.
In tal caso é "esclusa la responsabilitá" del costruttore.

La subtitución de elementos de seguridad (marcados con el simbolo ⚠) por componentes no homologados segun la norma CEI 65, provoca la no conformidad del aparato.
En ese caso, el fabricante cesa de ser responsable.

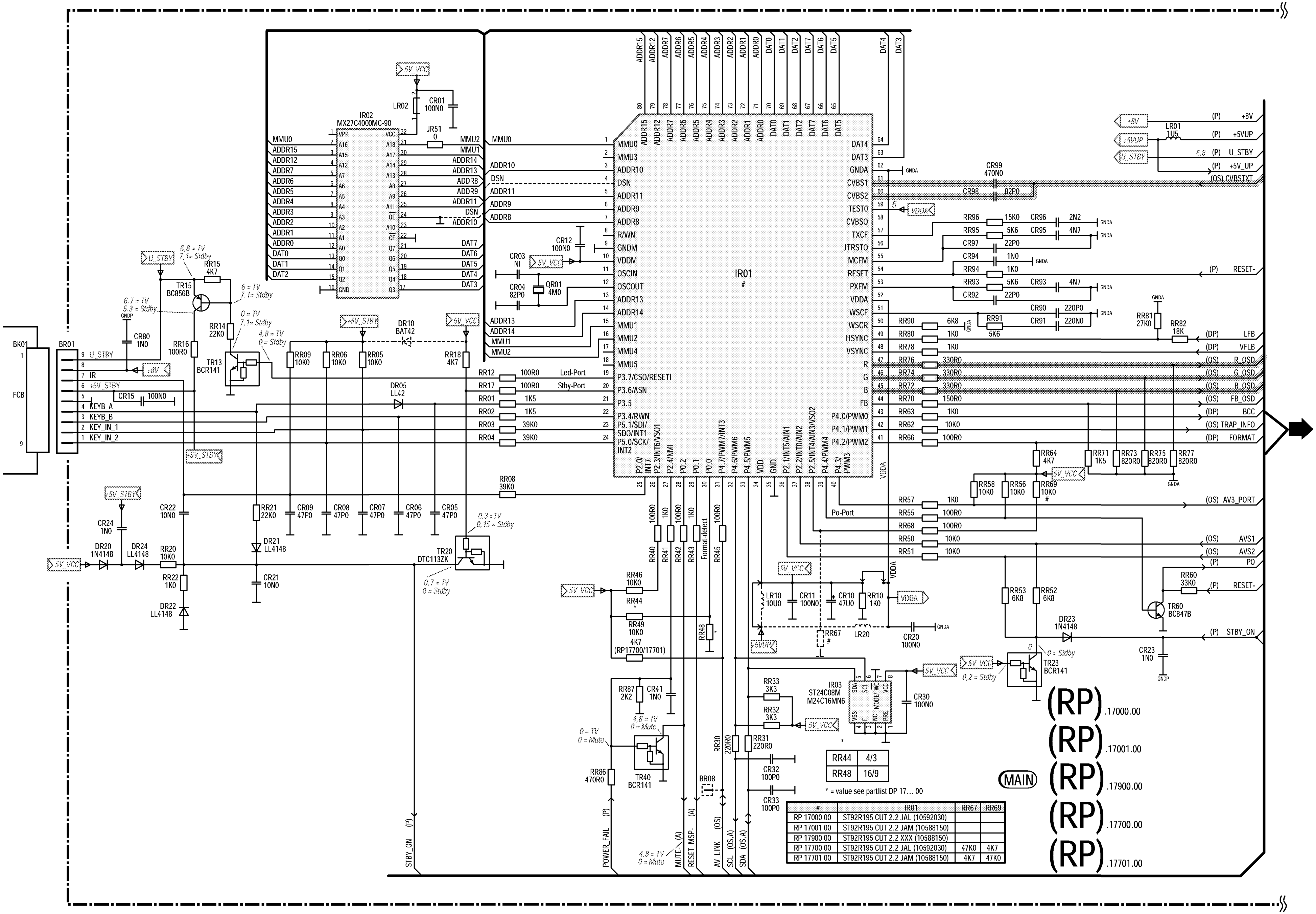
	TV ASY A80AEJ15X01 (A) 00 Tube 4/3 33" , MP
10575830	TV PSD CT 17062 26
CL21	16N2F +3.5% -3.5% 1K6V
CL22	30N0F +5% -5% 400.0V
CL24	560N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	10N0F +10% 63.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0% 100MI0W
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29 TBD 11
LL22	LF 650U0H +5% -5% R 2873 A0 00
LL26	LL 26U5H +10%
RF05	1R21 OHM +1% 700MI0W
RF06	10R0 OHM +1% 100MI0W
RL02	6K04 OHM +1% 100MI0W
RL03	4K75 OHM +1% 100MI0W
RL04	4K75 OHM +1% 100MI0W
RL05	4K75 OHM +1% 100MI0W
RL06	6K81 OHM +1% 100MI0W
RL19	13K0 OHM +5% 100MI0W
RL45	150K0 OHM +5% 100MI0W
RL48	76K8 OHM +1% 100MI0W
RL49	560K0 OHM +5% 100MI0W
RL65	RCF 4K7 OHM +5% 250MI0W
RV20	RMF 23K7 OHM +1% 250MI0W

	TV ASY A51EFS83X191 03 Tube 4/3 21" OT
10555770	TV PSD CT 17035 26
CL21	8N3F +3.5% -3.5% 1K6V
CL22	33N0F +5% -5% 1K0V
CL24	440N0F +5% -5% 250.0V
CL41	1N0F +10% -10% 50.0V
DL71	D-ZENER BZX55C24 24V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0% 100MI0W
LB02	LF 18U0H +7% -7%
LL05	TF-DST M30FBC3 10555640 3087 A0
LL22	LF 650U0H +5% -5% R 2873 A0 00
LL26	LL 85U0H 2519 A0
RF05	1R5 OHM +1% 700MI0W
RF06	10R0 OHM +1% 100MI0W
RL02	6K04 OHM +1% 100MI0W
RL03	10K0 OHM +1% 100MI0W
RL04	10K0 OHM +1% 100MI0W
RL05	10K0 OHM +1% 100MI0W
RL06	3K32 OHM +1% 100MI0W
RL45	110K0 OHM +5% 100MI0W
RL49	60K4 OHM +1% 100MI0W
RL65	4K7 OHM +5% 250MI0W
RV20	23K7 OHM +1% 250MI0W

	TV ASY A59EGD048X30 19 TV ASY A68EGD038X30 (A) 68 00 Tube 4/3 25" SF, 29" SF
10515520	TV PSD CT 17071 26
CL21	16N2F +3.5% -3.5% 1K6V
CL22	30N0F +5% -5% 400.0V
CL24	510N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	10N0F +10% 63.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55C30 30V 500MI0W
JL60	WIREBARE 22
JL80	0 OHM +0% 100MI0W
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29 TBD 13
LL22	LF 650U0H +5% -5%
LL26	LL 26U5H +10%
RF05	RMF 1R0 OHM +1% 700MI0W
RL02	6K8 OHM +5% 100MI0W
RL03	4K75 OHM +1% 100MI0W
RL04	4K75 OHM +1% 100MI0W
RL05	4K75 OHM +1% 100MI0W
RL06	4K75 OHM +1% 100MI0W
RL19	15K0 OHM +5% 100MI0W
RL45	180K0 OHM +5% 100MI0W
RL48	100K0 OHM +5% 100MI0W
RL49	300K0 OHM +5% 100MI0W
RL65	4K7 OHM +5% 250MI0W
RV20	33K2 OHM +1% 250MI0W

	TV ASY W56EGV023X015 56 01 TV ASY W66EGV023X015 66 00 TV ASY W76EGV023X015 (A) 00 Tube 16/9 24", 28",32", SF / vectorgun
10515530	TV PSD CT 17083 38
CL21	15N5F +3.5% -3.5% 1K6V
CL22	27N0F +5% -5% 400.0V
CL24	440N0F +5% -5% 250.0V
CL41	100P0F +10% -10% 50.0V
CL48	100N0F +5% 63.0V
CL51	290N0F +5% -5% 250.0V
DL48	D-SLP BAV103 200.0V
DL71	D-ZENER BZX55C24 24V 500MI0W
JL60	WIREBARE 22
JL82	0 OHM +0% 100MI0W
LB02	LF 32U0H +4% -4%
LL05	TF-DST TDS29 15314460 10
LL22	LF 650U0H +5% -5%
LL26	LL 30U5H 2519 A0
RF05	1R21 OHM +1% 700MI0W
RL02	4K99 OHM +1% 100MI0W
RL03	6K49 OHM +1% 100MI0W
RL04	6K49 OHM +1% 100MI0W
RL05	6K49 OHM +1% 100MI0W
RL06	2K37 OHM +1% 100MI0W
RL19	13K0 OHM +5% 100MI0W
RL45	390K0 OHM +5% 100MI0W
RL48	220K0 OHM +5% 100MI0W
RL49	180K0 OHM +5% 100MI0W
RL65	47K0 OHM +5% 250MI0W
RV20	100K0 OHM +1% 250MI0W

CONTROL MICROPROCESSOR - MICROPROCESSEUR DE COMMANDE - MIKROPROZESSOR - MICROPROCESSORE DEI COMANDI - MICROPROCESADOR DE LOS MANDOS

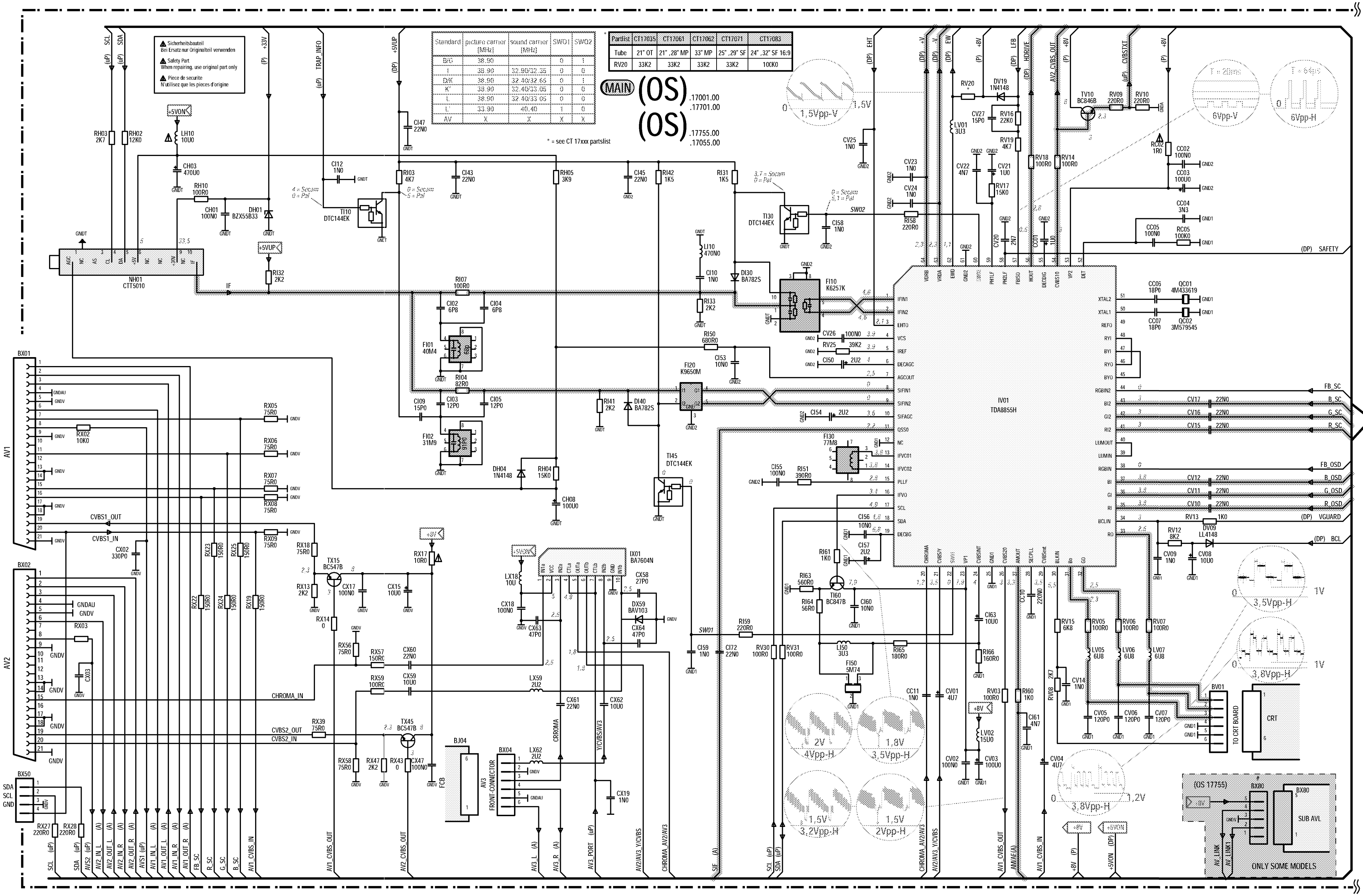

IR01
#
IRC2
MX27C4000MC-90
IR03
ST24C08M
M24C16MN6
BK01
BR01
FCB
U_STBY
IR
+5V_STBY
KEYB_A
KEYB_B
KEY_IN_1
KEY_IN_2
+8V
5V_VCC
5V_STBY
U_STBY
VDDA
5VUP
GNDA
GNDP
LR02
CR01
100N0
JR51
0
CR12
100N0
CR03
NI
CR04
82P0
QR01
4M0
TR15
BC856B
RR15
4K7
RR14
22K0
RR16
100R0
CR80
1N0
TR13
BCR141
DR10
BAT42
DR05
LL42
RR09
10K0
RR06
10K0
RR05
10K0
RR18
4K7
CR15
100N0
RR12
100R0
Led-Port
RR17
100R0
Stby-Port
RR01
1K5
RR02
1K5
RR03
39K0
RR04
39K0
RR08
39K0
CR22
10N0
CR24
1N0
DR20
1N4148
DR24
LL4148
RR20
10K0
RR22
1K0
DR22
LL4148
RR21
22K0
DR21
LL4148
CR21
10N0
CR09
47P0
CR08
47P0
CR07
47P0
CR06
47P0
CR05
47P0
TR20
DTC113ZK
0,3 = TV
0,15 = Stdby
0,7 = TV
0 = Stdby
6,8 = TV
7,1 = Stdby
6 = TV
7,1= Stdby
6,7 = TV
5,3 = Stdby
0 = TV
7,1= Stdby
4,8 = TV
0 = Stdby
MMU0
MMU1
MMU2
MMU3
MMU4
MMU5
ADDR0
ADDR1
ADDR2
ADDR3
ADDR4
ADDR5
ADDR6
ADDR7
ADDR8
ADDR9
ADDR10
ADDR11
ADDR12
ADDR13
ADDR14
ADDR15
DAT0
DAT1
DAT2
DAT3
DAT4
DAT5
DAT6
DAT7
DSN
R/WN
GNDM
VDDM
OSCIN
OSCOUT
P3.7/CSO/RESETI
P3.6/ASN
P3.5
P3.4/RWN
P5.1/SDI/
SDO/INT1
P5.0/SCK/
INT2
P2.0/INT7
P2.3/INT6/VSO1
P2.4/NMI
P0.2
P0.1
P0.0
P4.7/PWM7/INT3
P4.6/PWM6
P4.5/PWM5
VDD
GND
P2.1/INT5/AIN1
P2.2/INT0/AIN2
P2.5/INT4/AIN3/VSO2
P4.4/PWM4
P4.3/PWM3
DAT4
DAT3
GNDA
CVBS1
CVBS2
TEST0
CVBSO
TXCF
JTRSTO
MCFM
RESET
PXFM
VDDA
WSCF
WSCR
HSYNC
VSYNC
R
G
B
FB
P4.0/PWM0
P4.1/PWM1
P4.2/PWM2
LR01
1U5
CR99
470N0
CR98
82P0
RR96
15K0
CR96
2N2
RR95
5K6
CR95
4N7
CR97
22P0
CR94
1N0
RR94
1K0
RR93
5K6
CR93
4N7
CR92
22P0
CR90
220P0
CR91
220N0
RR91
5K6
RR90
6K8
RR80
1K0
RR78
1K0
RR76
330R0
RR74
330R0
RR72
330R0
RR70
150R0
RR63
1K0
RR62
10K0
RR66
100R0
RR81
27K0
RR82
18K
(P) +8V
(P) +5VUP
6,8 (P) U_STBY
(P) +5V_UP
(OS) CVBSTXT
(P) RESET-
(DP) LFB
(DP) VFLB
(OS) R_OSD
(OS) G_OSD
(OS) B_OSD
(OS) FB_OSD
(DP) BCC
(OS) TRAP_INFO
(DP) FORMAT
(OS) AV3_PORT
(OS) AVS1
(OS) AVS2
(P) PO
(P) RESET-
(P) STBY_ON
RR64
4K7
RR71
1K5
RR73
820R0
RR75
820R0
RR77
820R0
RR58
10K0
RR56
10K0
RR69
10K0
#
RR57
1K0
RR55
100R0
Po-Port
RR68
100R0
RR50
10K0
RR51
10K0
RR60
33K0
TR60
BC847B
RR53
6K8
RR52
6K8
DR23
1N4148
CR23
1N0
TR23
BCR141
0 = Stdby
0,2 = Stdby
RR40
100R0
RR41
1K0
RR42
100R0
RR43
1K0
Format-detect
RR45
100R0
RR46
10K0
RR44
*
RR49
10K0
4K7
(RP17700/17701)
RR48
*
RR67
#
LR10
10U0
CR11
100N0
CR10
47U0
RR10
1K0
LR20
CR20
100N0
RR87
2K2
CR41
1N0
4,8 = TV
0 = Mute
0 = TV
0 = Mute
TR40
BCR141
RR86
470R0
BR08
RR33
3K3
RR32
3K3
RR31
220R0
RR30
220R0
CR30
100N0
CR32
100P0
CR33
100P0
SDA
SCL
MODE/WC
VCC
VSS
E
NC
PRE
STBY_ON (P)
POWER_FAIL (P)
MUTE- (A)
RESET_MSP- (A)
AV_LINK (OS)
SCL (OS,A)
SDA (OS,A)
4,8 = TV
0 = Mute
MAIN
(RP).17000.00
(RP).17001.00
(RP).17900.00
(RP).17700.00
(RP).17701.00

RR44	4/3
RR48	16/9

* = value see partlist DP 17… 00

#	IR01	RR67	RR69
RP 17000 00	ST92R195 CUT 2.2 JAL (10592030)		
RP 17001 00	ST92R195 CUT 2.2 JAM (10588150)		
RP 17900 00	ST92R195 CUT 2.2 XXX (10588150)		
RP 17700 00	ST92R195 CUT 2.2 JAL (10592030)	47K0	4K7
RP 17701 00	ST92R195 CUT 2.2 JAM (10588150)	4K7	47K0

RF/FI/ SCART INTERFACE/VIDEO SIGNAL PROCESSING -HF/FI INTERFACE PERITELEVISION/TRAITEMENT LUMINANCE CHROMINANCE - HF/ZF/ SCART INTERFACE/VIDEO SIGNALVERARBEITUNG - RF/FI /PRESA PERITEL/ELABORAZIONE VIDEO - RF/FI /EUROCONECTOR / TRATAMENTO VIDEO



⚠ Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden

⚠ Safety Part
When repairing, use original part only

⚠ Piece de securite
N'utilisez que les pieces d'origine

Standard	picture carrier [MHz]	sound carrier [MHz]	SW01	SW02
B/G	38.90		0	1
I	38.90	32.90/32.35	0	0
D/K	38.90	32.40/32.65	0	1
K'	38.90	32.40/33.05	0	0
L	38.90	32.40/33.05	0	0
L'	33.90	40.40	1	0
AV	X	X	X	X

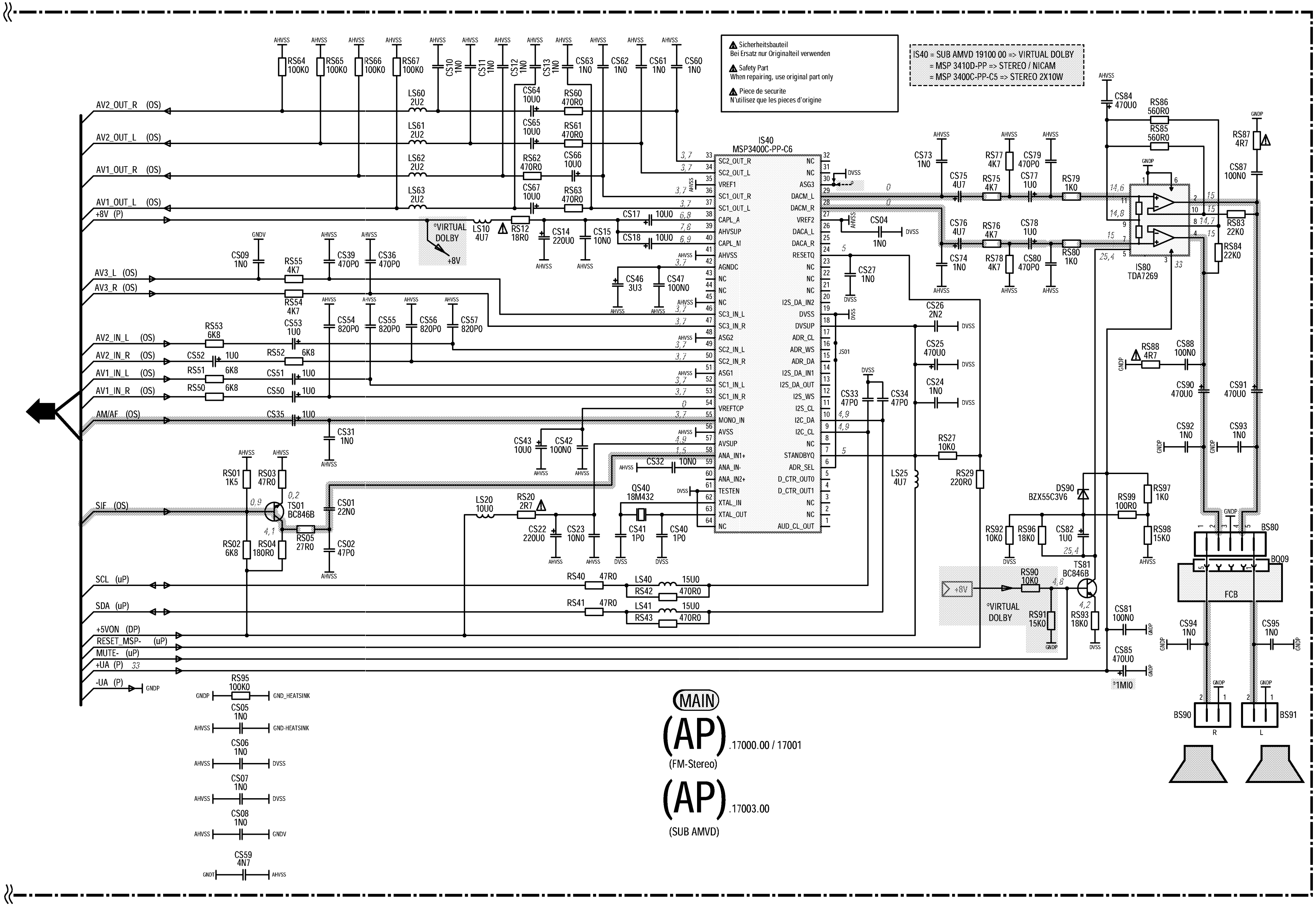
Partlist*	CT17035	CT17061	CT17062	CT17071	CT17083
Tube	21" OT	21" ,28" MP	33" MP	25" ,29" SF	24" ,32" SF 16:9
RV20	33K2	33K2	33K2	33K2	100K0

* = see CT 17xxx partslist

MAIN (OS) .17001.00 .17701.00
(OS) .17755.00 .17055.00

IV01
TDA8855H
IX01
BA7604N
NH01
CT5010
FI10
K6257K
FI20
K9650M
FI30
77M8
FI01
40M4
FI02
31M9
FI50
5M74
TI10
DTC144EK
TI30
DTC144EK
TI45
DTC144EK
TI60
BC847B
TX15
BC547B
TX45
BC547B
TV10
BC846B
BX01
AV1
BX02
AV2
BX50
SDA
SCL
GND
BX04
AV3
FRONT-CONNECTOR
BJ04
FCB
BV01
TO CRT BOARD
CRT
BX80
SUB AVL
(OS 17755)
ONLY SOME MODELS
AV_LINK
AV_LINK1
CVBS1_OUT
CVBS1_IN
CVBS2_OUT
CVBS2_IN
CHROMA_IN
IF
SW01
SW02
4 = Secam
0 = Pal
0 = Secam
5 = Pal
3,7 = Secam
0 = Pal
0 = Secam
5,1 = Pal
T = 20ms
6Vpp-V
T = 64µs
6Vpp-H
1,5Vpp-V
1,5V
3,5Vpp-H
1V
3,8Vpp-H
1V
2V
4Vpp-H
1,8V
3,5Vpp-H
1,5V
3,2Vpp-H
1,5V
2Vpp-H
3,8Vpp-H
1,2V
(DP) SAFETY
FB_SC
B_SC
G_SC
R_SC
FB_OSD
B_OSD
G_OSD
R_OSD
(DP) VGUARD
(DP) BCL
SCL (uP)
SDA (uP)
+33V (P)
TRAP_INFO (uP)
+5VUP (DP)
EHT (DP)
+V (DP)
-V (DP)
EW (DP)
+8V (P)
LFB (DP)
HDRIVE (DP)
AV2_CVBS_OUT
+8V (P)
CVBSTXT (uP)
+8V (P)
+5VON
+5VUP
+8V
AV2_IN_L
AV2_OUT_L
AV2_IN_R
AV2_OUT_R
AVS1 (uP)
AV1_IN_L
AV1_OUT_L
AV1_IN_R
AV1_OUT_R
FB_SC
R_SC
G_SC
B_SC
AV1_CVBS_IN
AV1_CVBS_OUT
AV2_CVBS_OUT
AV3_L (A)
AV3_R (A)
AV3_PORT (uP)
AV2/AV3_Y/CVBS
CHROMA_AV2/AV3
SIF (A)
SCL (uP)
SDA (uP)
CHROMA_AV2/AV3
AV2/AV3_Y/CVBS
AV1_CVBS_OUT
AM/AF(A)
AV1_CVBS_IN
+8V (P)
+5VON (P)

AMPLIFIER SCHEMATIC DIAGRAM - SCHEMA DE L'AMPLIFICATEUR - SCHALTBILD AUDIO-SIGNALVERABEITUNG - SCHEMA DELL' AMPLIFICATORE
ESQUEMA DEL AMPLIFICADOR
(STEREO)



⚠ Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden

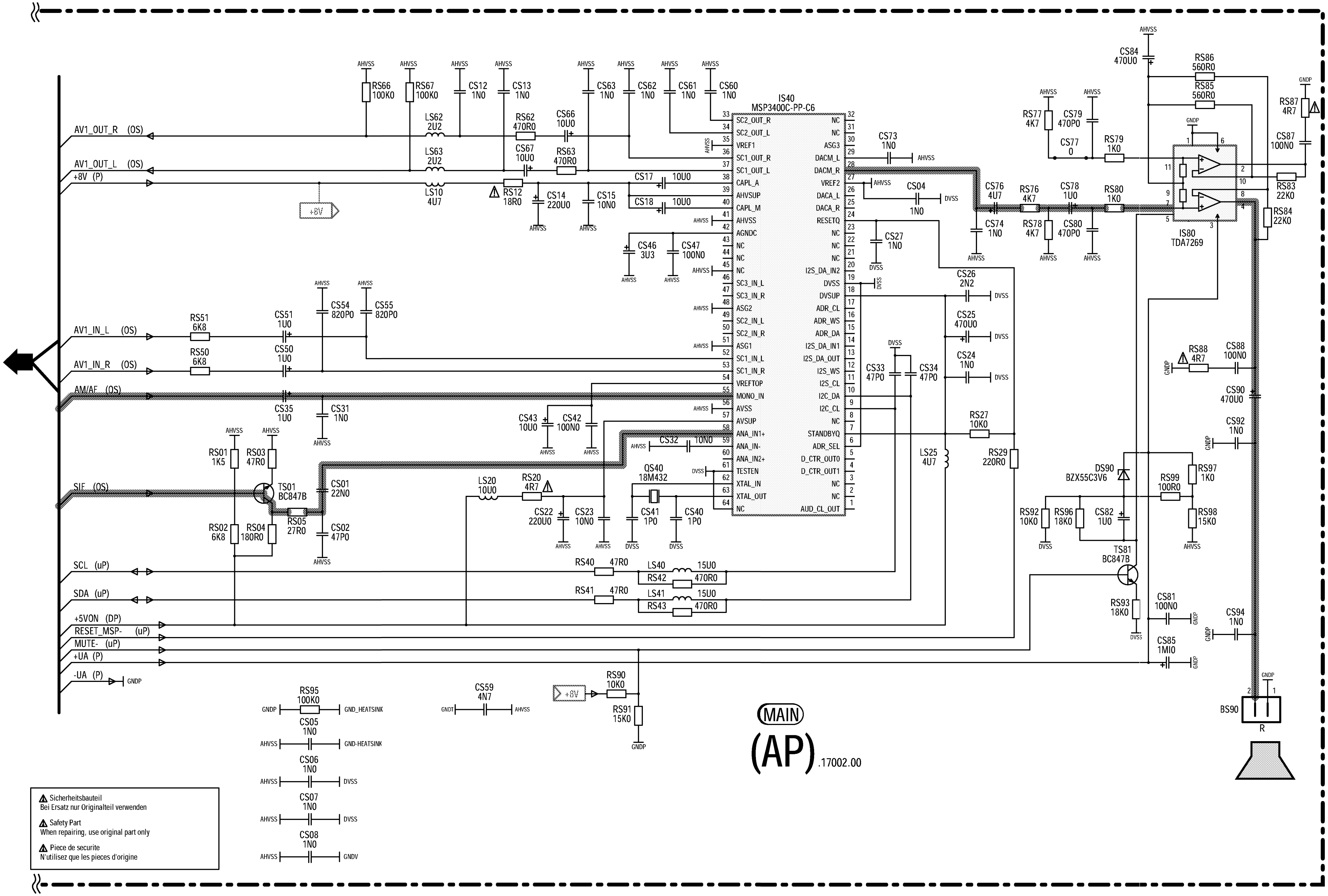
⚠ Safety Part
When repairing, use original part only

⚠ Piece de securite
N'utilisez que les pieces d'origine

IS40 = SUB AMVD 19100 00 => VIRTUAL DOLBY
= MSP 3410D-PP => STEREO / NICAM
= MSP 3400C-PP-C5 => STEREO 2X10W

AV2_OUT_R (OS)
AV2_OUT_L (OS)
AV1_OUT_R (OS)
AV1_OUT_L (OS)
+8V (P)
AV3_L (OS)
AV3_R (OS)
AV2_IN_L (OS)
AV2_IN_R (OS)
AV1_IN_L (OS)
AV1_IN_R (OS)
AM/AF (OS)
SIF (OS)
SCL (uP)
SDA (uP)
+5VON (DP)
RESET_MSP- (uP)
MUTE- (uP)
+UA (P) 33
-UA (P)
GNDP
RS64 100K0
RS65 100K0
RS66 100K0
RS67 100K0
CS10 1N0
CS11 1N0
CS12 1N0
CS13 1N0
CS63 1N0
CS62 1N0
CS61 1N0
CS60 1N0
LS60 2U2
LS61 2U2
LS62 2U2
LS63 2U2
CS64 10U0
RS60 470R0
CS65 10U0
RS61 470R0
RS62 470R0
CS66 10U0
CS67 10U0
RS63 470R0
°VIRTUAL DOLBY
+8V
LS10 4U7
RS12 18R0
CS14 220U0
CS15 10N0
CS17 10U0
CS18 10U0
CS09 1N0
RS55 4K7
CS39 470P0
CS36 470P0
RS54 4K7
RS53 6K8
CS53 1U0
CS54 820P0
CS55 820P0
CS56 820P0
CS57 820P0
CS52 1U0
RS52 6K8
RS51 6K8
CS51 1U0
RS50 6K8
CS50 1U0
CS35 1U0
CS31 1N0
CS46 3U3
CS47 100N0
CS43 10U0
CS42 100N0
RS01 1K5
RS03 47R0
TS01 BC846B
CS01 22N0
RS02 6K8
RS04 180R0
RS05 27R0
CS02 47P0
LS20 10U0
RS20 2R7
CS22 220U0
CS23 10N0
CS32 10N0
QS40 18M432
CS41 1P0
CS40 1P0
RS40 47R0
RS41 47R0
LS40 15U0
RS42 470R0
LS41 15U0
RS43 470R0
IS40 MSP3400C-PP-C6
SC2_OUT_R
SC2_OUT_L
VREF1
SC1_OUT_R
SC1_OUT_L
CAPL_A
AHVSUP
CAPL_M
AHVSS
AGNDC
NC
SC3_IN_L
SC3_IN_R
ASG2
SC2_IN_L
SC2_IN_R
ASG1
SC1_IN_L
SC1_IN_R
VREFTOP
MONO_IN
AVSS
AVSUP
ANA_IN1+
ANA_IN-
ANA_IN2+
TESTEN
XTAL_IN
XTAL_OUT
ASG3
DACM_L
DACM_R
VREF2
DACA_L
DACA_R
RESETQ
I2S_DA_IN2
DVSS
DVSUP
ADR_CL
ADR_WS
ADR_DA
I2S_DA_IN1
I2S_DA_OUT
I2S_WS
I2S_CL
I2C_DA
I2C_CL
STANDBYQ
ADR_SEL
D_CTR_OUT0
D_CTR_OUT1
AUD_CL_OUT
CS04 1N0
CS27 1N0
CS26 2N2
CS25 470U0
CS24 1N0
CS33 47P0
CS34 47P0
RS27 10K0
RS29 220R0
LS25 4U7
JS01
CS73 1N0
RS77 4K7
CS79 470P0
CS75 4U7
RS75 4K7
CS77 1U0
RS79 1K0
CS76 4U7
RS76 4K7
CS78 1U0
CS74 1N0
RS78 4K7
CS80 470P0
RS80 1K0
CS84 470U0
RS86 560R0
RS85 560R0
RS87 4R7
CS87 100N0
IS80 TDA7269
RS83 22K0
RS84 22K0
RS88 4R7
CS88 100N0
CS90 470U0
CS91 470U0
CS92 1N0
CS93 1N0
DS90 BZX55C3V6
RS99 100R0
RS97 1K0
RS92 10K0
RS96 18K0
CS82 1U0
RS98 15K0
TS81 BC846B
RS90 10K0
RS91 15K0
RS93 18K0
CS81 100N0
CS85 470U0
°1MI0
BS80
BQ09
FCB
CS94 1N0
CS95 1N0
BS90
BS91
R
L
AHVSS
DVSS
GNDV
GNDP
RS95 100K0
GND_HEATSINK
CS05 1N0
GND-HEATSINK
CS06 1N0
CS07 1N0
CS08 1N0
CS59 4N7
GNDT
MAIN
(AP) .17000.00 / 17001
(FM-Stereo)
(AP) .17003.00
(SUB AMVD)

AMPLIFIER SCHEMATIC DIAGRAM - SCHEMA DE L'AMPLIFICATEUR - SCHALTBILD AUDIO-SIGNALVERABEITUNG - SCHEMA DELL' AMPLIFICATORE - ESQUEMA DEL AMPLIFICADOR
(MONO)


AV1_OUT_R (OS)
AV1_OUT_L (OS)
+8V (P)
AV1_IN_L (OS)
AV1_IN_R (OS)
AM/AF (OS)
SIF (OS)
SCL (uP)
SDA (uP)
+5VON (DP)
RESET_MSP- (uP)
MUTE- (uP)
+UA (P)
-UA (P)
GNDP
IS40
MSP3400C-PP-C6
SC2_OUT_R
SC2_OUT_L
VREF1
SC1_OUT_R
SC1_OUT_L
CAPL_A
AHVSUP
CAPL_M
AHVSS
AGNDC
NC
SC3_IN_L
SC3_IN_R
ASG2
SC2_IN_L
SC2_IN_R
ASG1
SC1_IN_L
SC1_IN_R
VREFTOP
MONO_IN
AVSS
AVSUP
ANA_IN1+
ANA_IN-
ANA_IN2+
TESTEN
XTAL_IN
XTAL_OUT
ASG3
DACM_L
DACM_R
VREF2
DACA_L
DACA_R
RESETQ
I2S_DA_IN2
DVSS
DVSUP
ADR_CL
ADR_WS
ADR_DA
I2S_DA_IN1
I2S_DA_OUT
I2S_WS
I2S_CL
I2C_DA
I2C_CL
STANDBYQ
ADR_SEL
D_CTR_OUT0
D_CTR_OUT1
AUD_CL_OUT
RS66 100K0
RS67 100K0
CS12 1N0
CS13 1N0
LS62 2U2
LS63 2U2
LS10 4U7
RS62 470R0
CS66 10U0
CS67 10U0
RS63 470R0
RS12 18R0
CS14 220U0
CS15 10N0
CS63 1N0
CS62 1N0
CS61 1N0
CS60 1N0
CS17 10U0
CS18 10U0
CS46 3U3
CS47 100N0
CS54 820P0
CS55 820P0
RS51 6K8
CS51 1U0
RS50 6K8
CS50 1U0
CS35 1U0
CS31 1N0
CS43 10U0
CS42 100N0
CS32 10N0
RS01 1K5
RS03 47R0
TS01 BC847B
RS05 27R0
CS01 22N0
CS02 47P0
RS02 6K8
RS04 180R0
LS20 10U0
RS20 4R7
CS22 220U0
CS23 10N0
QS40 18M432
CS41 1P0
CS40 1P0
RS40 47R0
RS42 470R0
LS40 15U0
RS41 47R0
RS43 470R0
LS41 15U0
CS73 1N0
CS04 1N0
CS27 1N0
CS26 2N2
CS25 470U0
CS24 1N0
CS33 47P0
CS34 47P0
RS27 10K0
RS29 220R0
LS25 4U7
CS76 4U7
CS74 1N0
RS76 4K7
RS78 4K7
CS78 1U0
CS80 470P0
RS80 1K0
RS77 4K7
CS79 470P0
CS77 0
RS79 1K0
CS84 470U0
RS86 560R0
RS85 560R0
RS87 4R7
CS87 100N0
RS83 22K0
RS84 22K0
IS80 TDA7269
RS88 4R7
CS88 100N0
CS90 470U0
CS92 1N0
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RS99 100R0
RS97 1K0
RS98 15K0
RS92 10K0
RS96 18K0
CS82 1U0
TS81 BC847B
RS93 18K0
CS81 100N0
CS85 1MI0
CS94 1N0
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RS95 100K0
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CS06 1N0
CS07 1N0
CS08 1N0
GND_HEATSINK
GND-HEATSINK
AHVSS
DVSS
GNDV
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+8V
MAIN
(AP) .17002.00

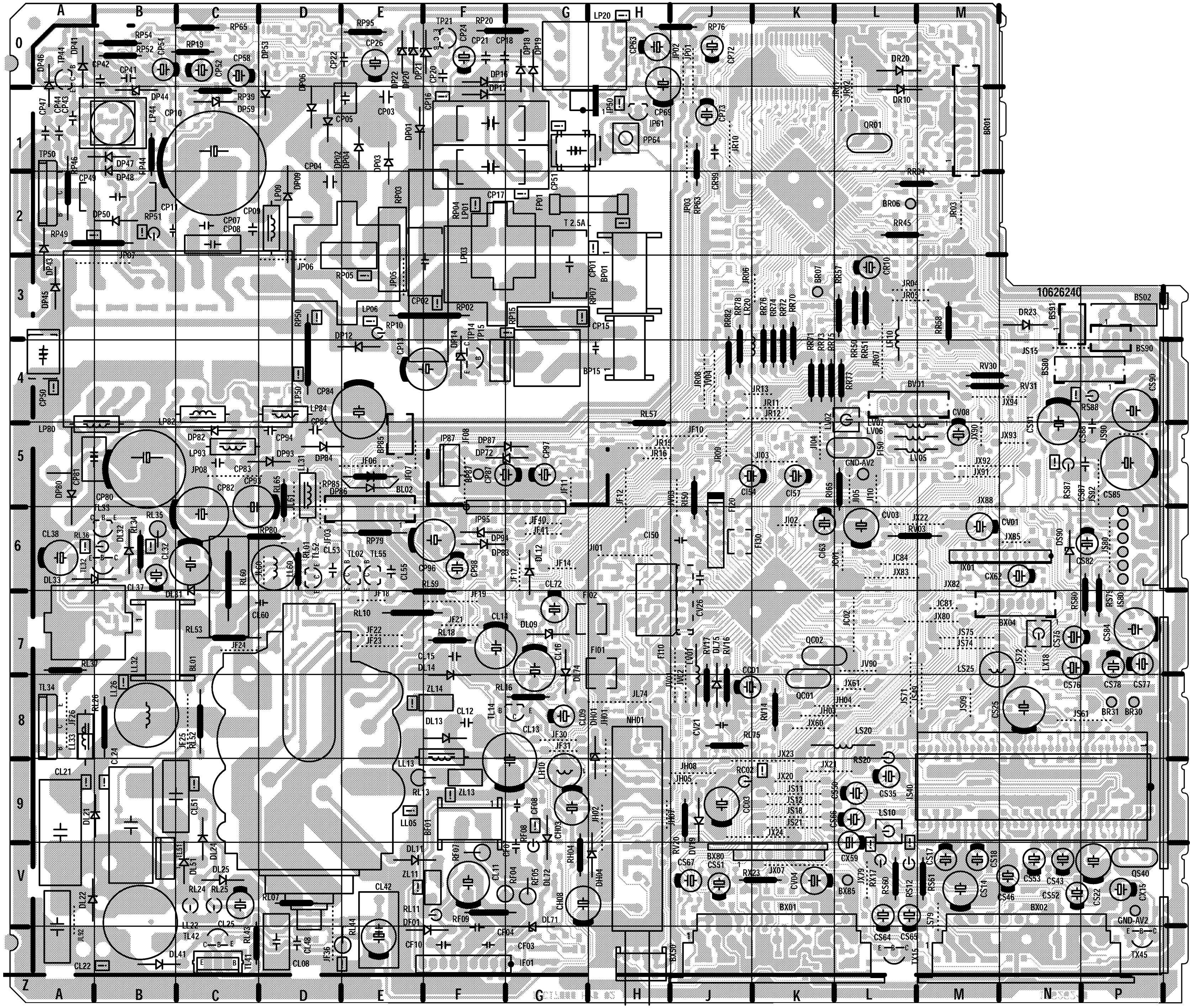
⚠ Sicherheitsbauteil
Bei Ersatz nur Originalteil verwenden

⚠ Safety Part
When repairing, use original part only

⚠ Piece de securite
N'utilisez que les pieces d'origine

MAIN BOARD - PLATINE PRINCIPALE - CHASSIS GRUNDPLATTE - PIASTRA PRINCIPALE - PLATINA PRINCIPAL

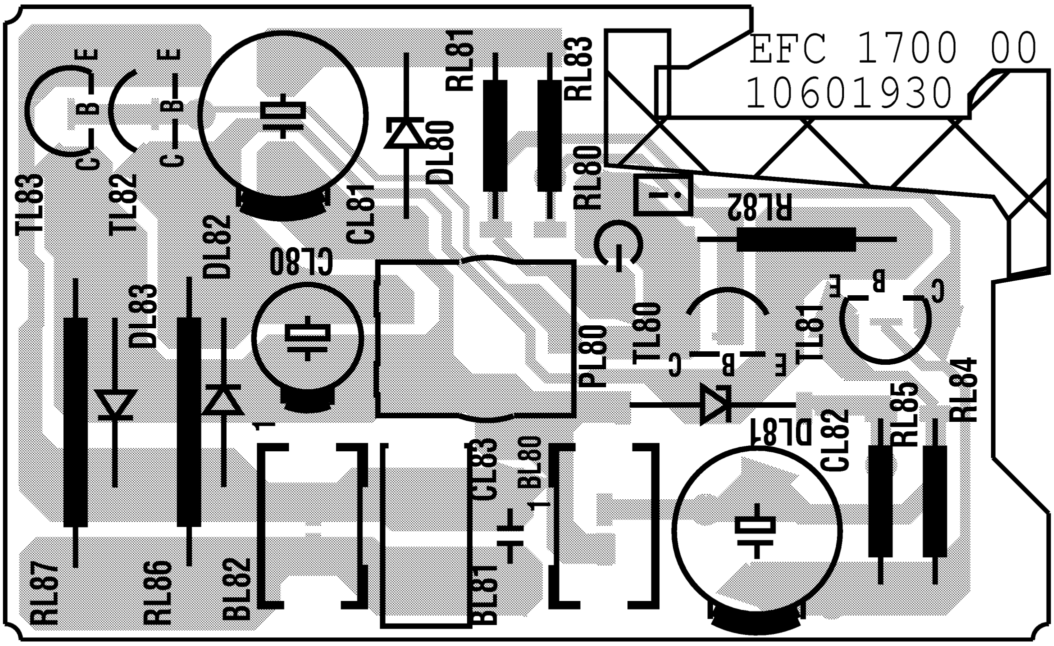
COMPONENT SIDE - COTE COMPOSANTS - BESTÜCKUNGSSEITE - LATO COMPONENTI - LADO COMPONENTES



Updated 04 / 99

EFC 17000
EARTH-FIELD CORRECTION BOARD

COMPONENT SIDE - CÔTE COMPOSANTS - BESTÜCKUNGSSEITE -LATO COMPONENTI
LADO COMPONENTES



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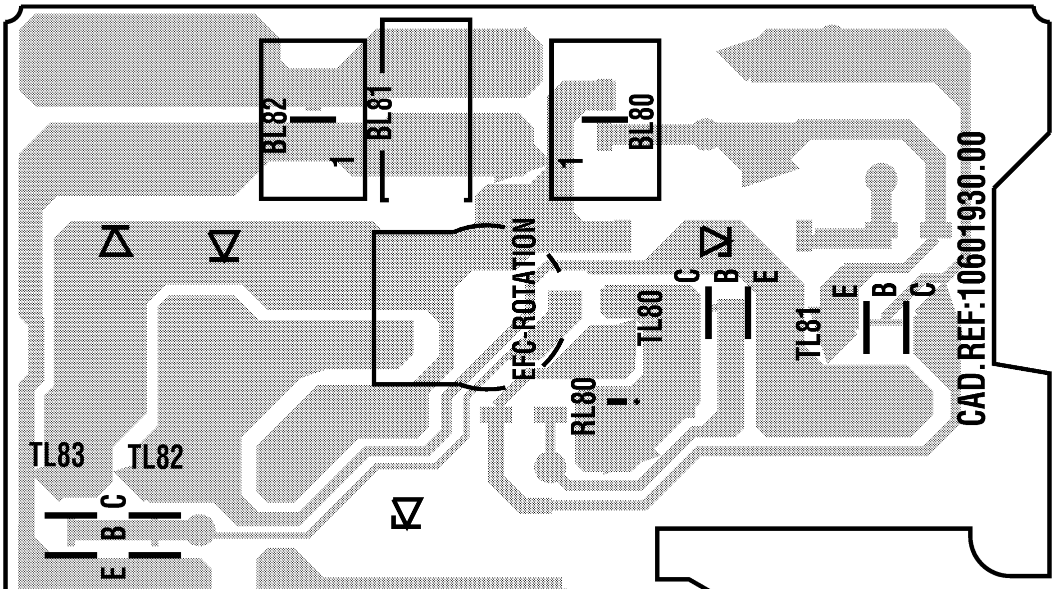
SOLDER SIDE - CÔTE SOUDURES - LÖTSEITE - LATO SALDATURE - LADO SOLDADURAS



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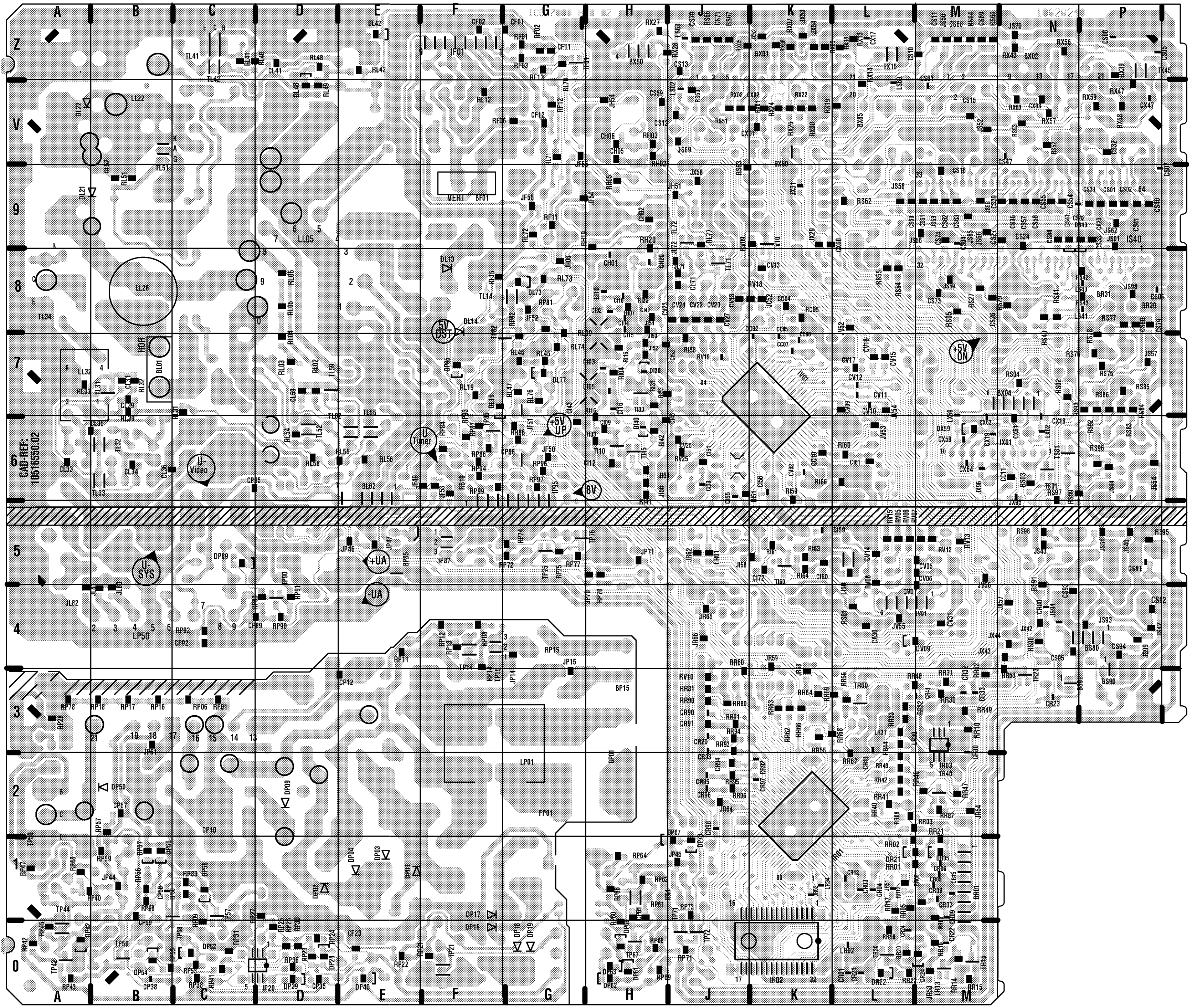
SOLDER SIDE - CÔTE SOUDURES - LÖTSEITE - LATO SALDATURE - LADO SOLDADURAS



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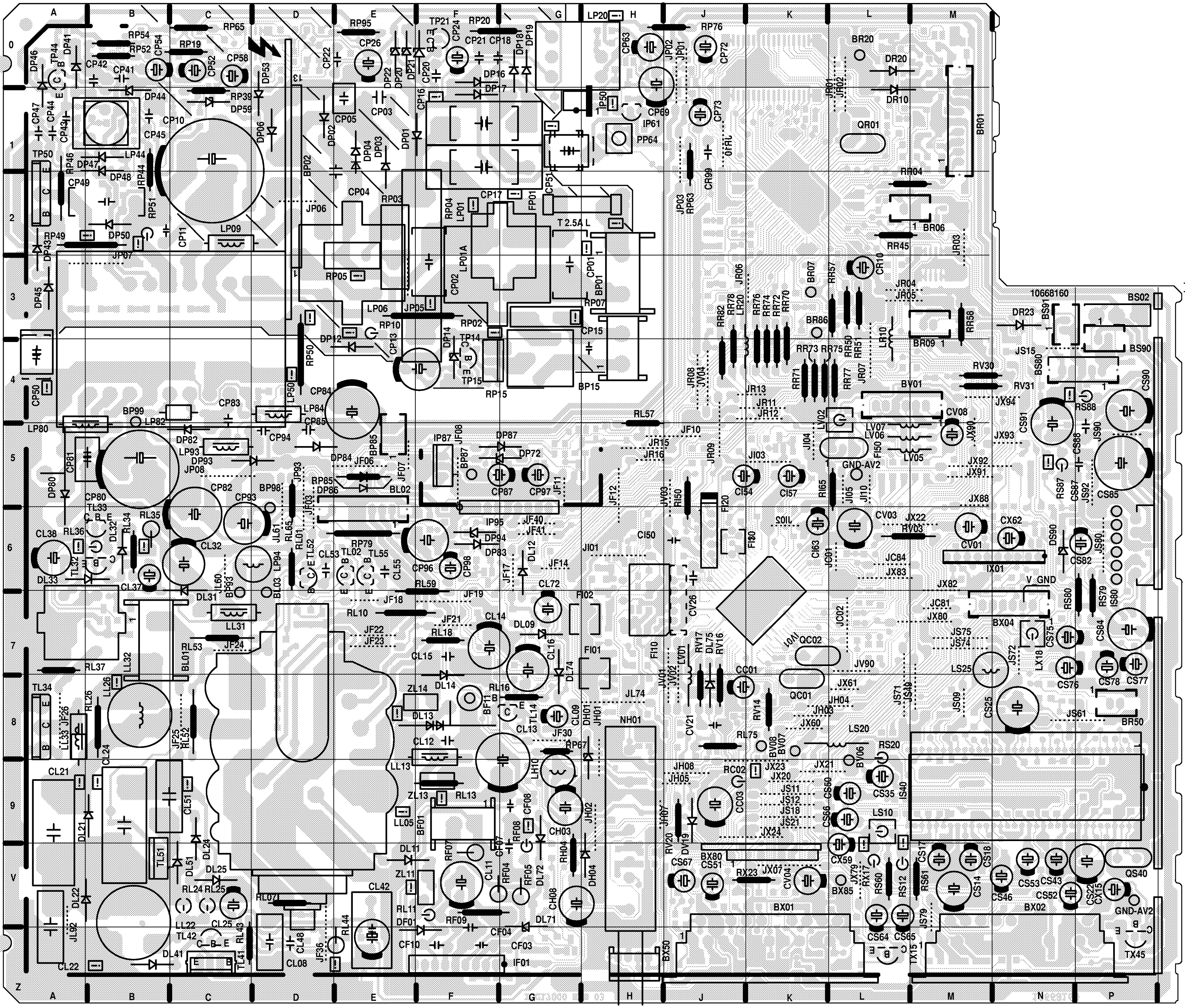
MAIN BOARD - PLATINE PRINCIPALE - CHASSIS GRUNDPLATTE - PIASTRA PRINCIPALE - PLATINA PRINCIPAL

COMPONENT SIDE - COTE COMPOSANTS - BESTÜCKUNGSSEITE - LATO COMPONENTI - LADO COMPONENTES



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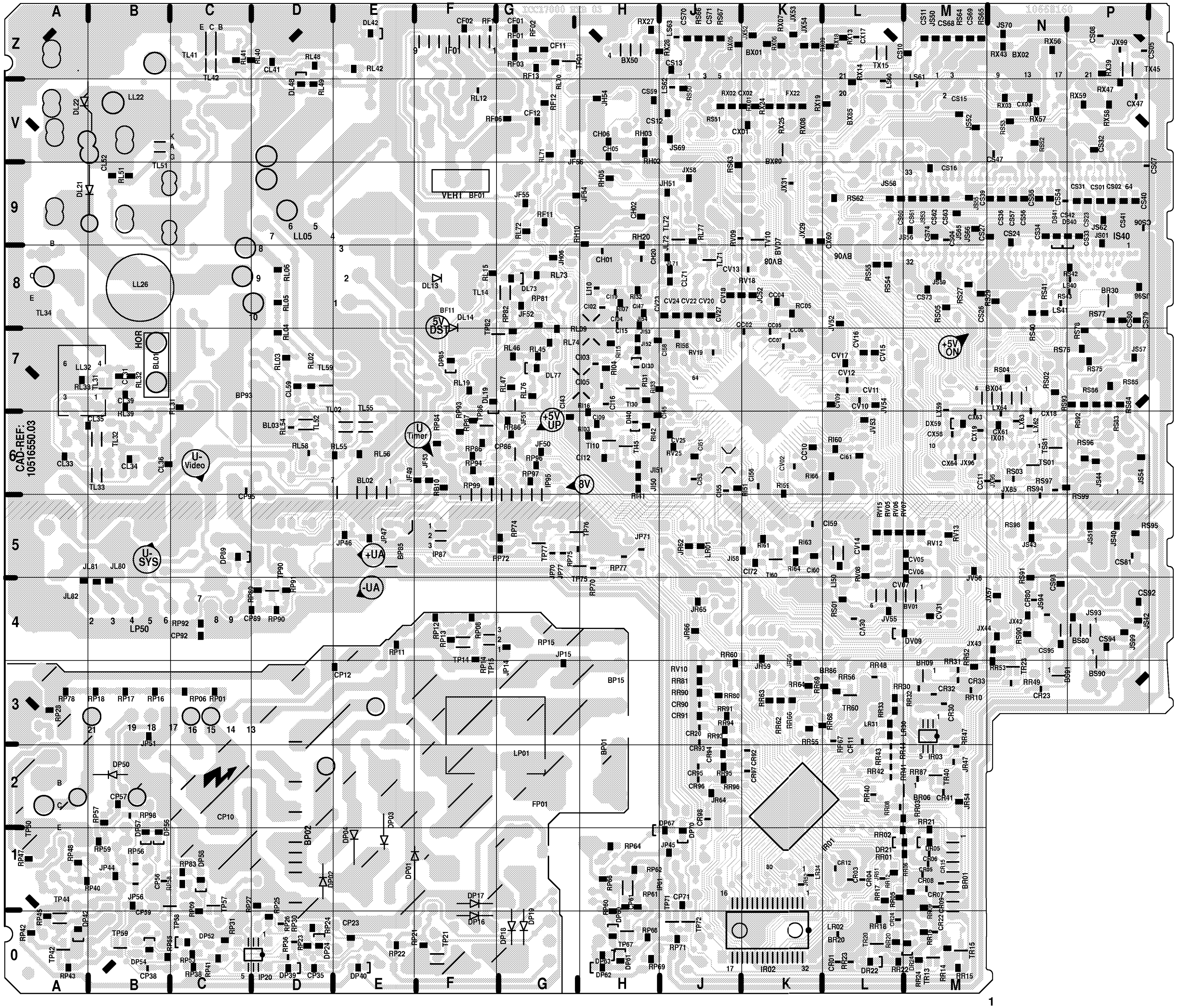
SOLDER SIDE - CÔTE SOUDURES - LÖTSEITE - LATO SALDATURE - LADO SOLDADURAS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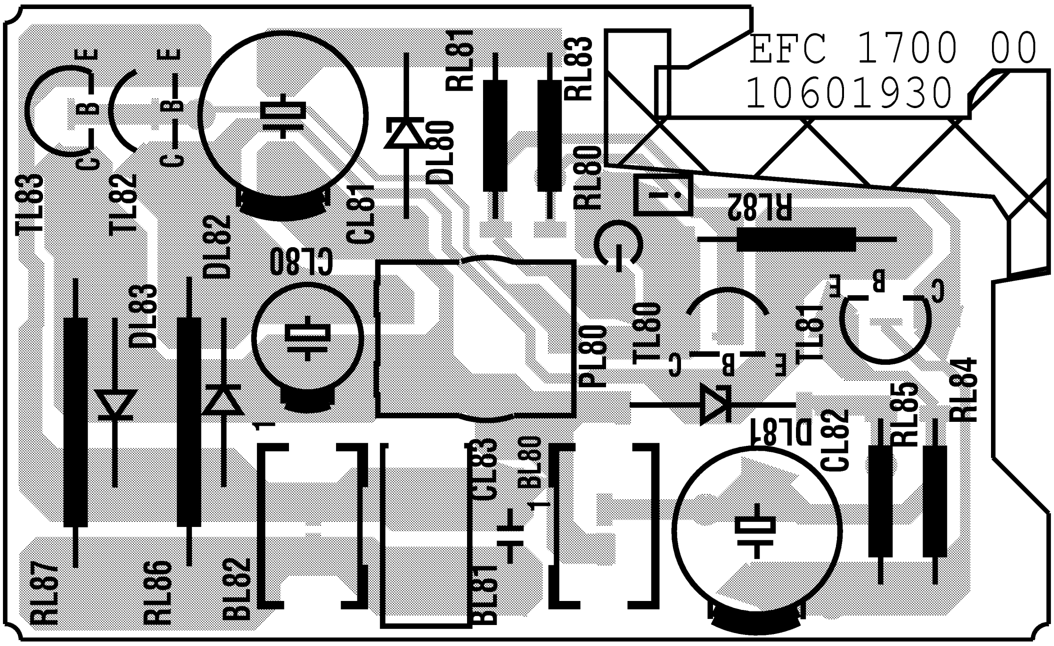
EFC 17000
EARTH-FIELD CORRECTION BOARD

COMPONENT SIDE - CÖTE COMPOSANTS - BESTÜCKUNGSSEITE -LATO COMPONENTI
LADO COMPONENTES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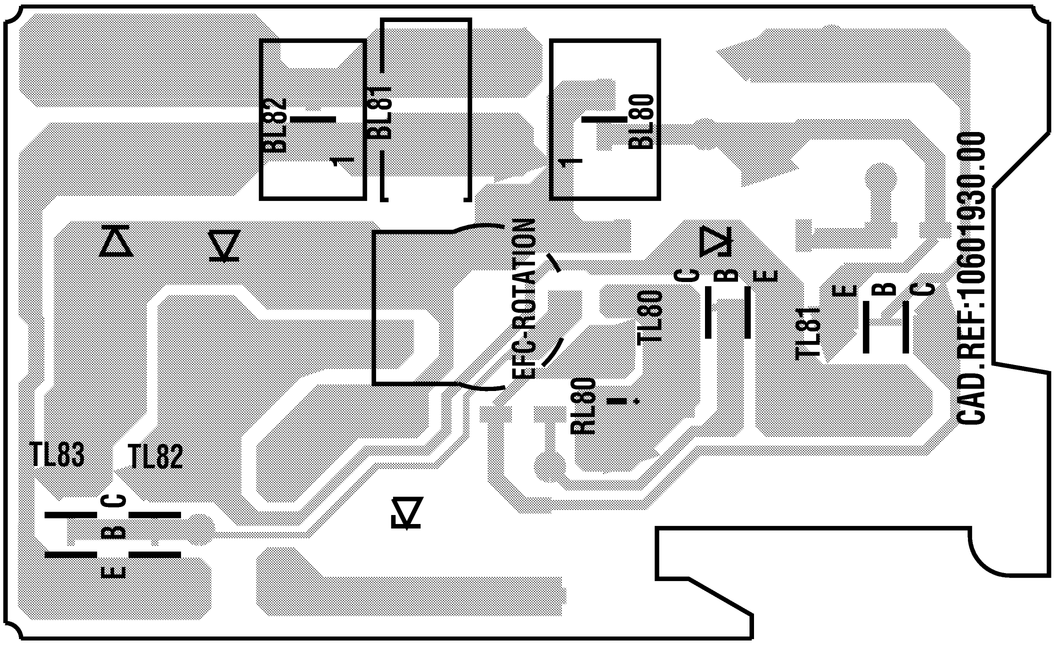
SOLDER SIDE - CÔTE SOUDURES - LÖTSEITE - LATO SALDATURE - LADO SOLDADURAS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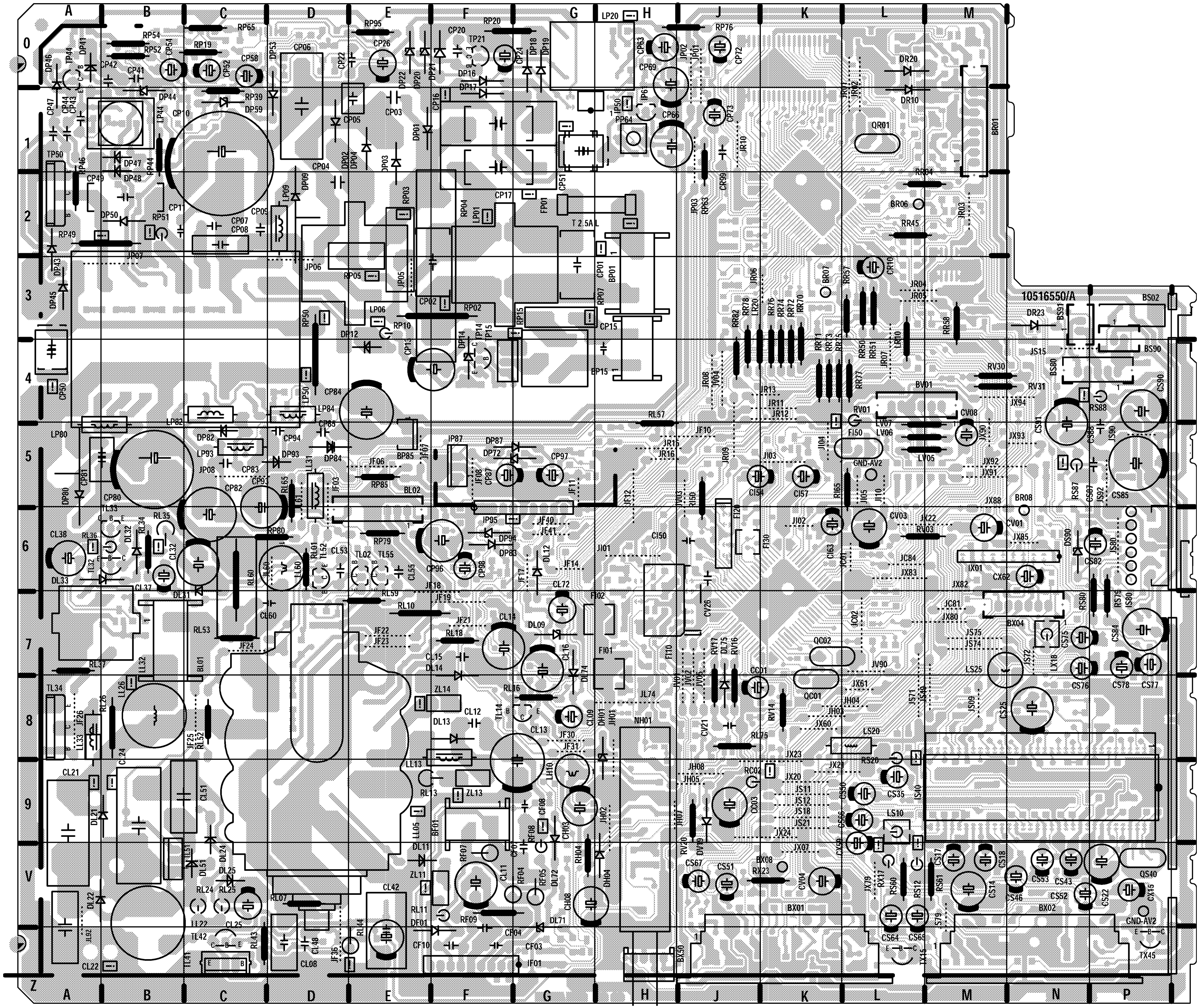
TL82

MAIN BOARD - PLATINE PRINCIPALE - CHASSIS GRUNDPLATTE - PIASTRA PRINCIPALE - PLATINA PRINCIPAL

COMPONENT SIDE - COTE COMPOSANTS - BESTÜCKUNGSSEITE - LATO COMPONENTI - LADO COMPONENTES



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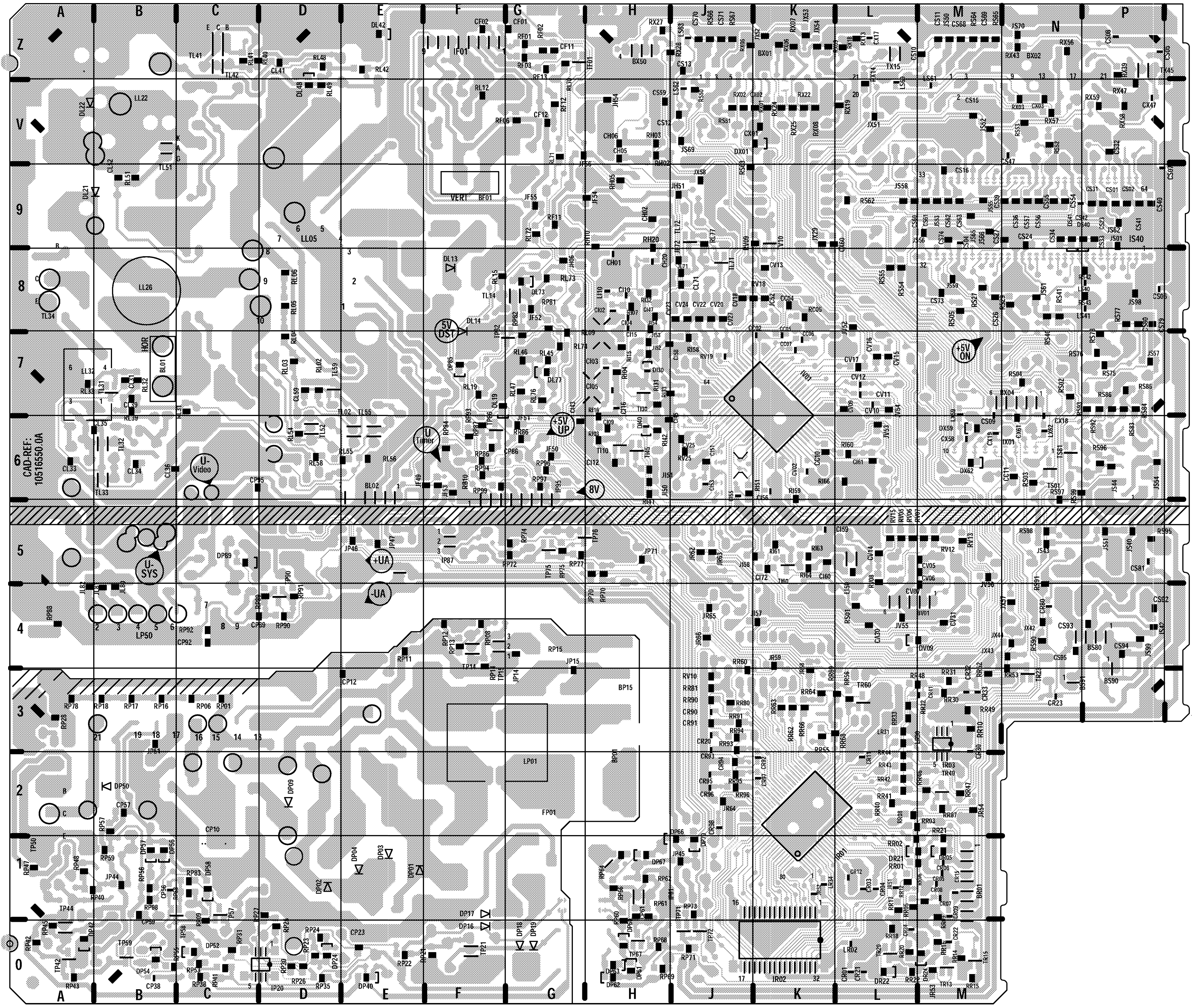
ICC17

First issue 07 / 98

SOLDER SIDE - CÔTE SOUDURES - LÖTSEITE - LATO SALDATURE - LADO SOLDADURAS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THOMSON MULTIMEDIA

TV

Brandt FERGUSON SABA TELEFUNKEN THOMSON

PARTS LIST
LISTE PIECES DETACHEES
ERSATZTEILLISTE
LISTA PARTI DI RICAMBIO
LISTA DE PIEZAS DE REPUESTO

THOMSON

Chassis ICC17

MODULES

MAIN	**IC17F5RQ02603C**		
AVL	**SUBAVL17000**	**R**	**10614890**
CRT	**CRT17700 (PCB HYB 02)**	**R**	**10651940**
FCB	**FCB1701**	**R**	**25313060**
KDB	**KDB1706**	**R**	**25388640**

GK01	TSOP1333	25358570
IB01	TDA6107Q/N2	10659660
IF01	TDA8351	20753830
IP20	TS3702CD FLAT	10537330
IP50	TLP621 GR(D4-LF2 T)	⚠ 20827900
IP61	TL431ACZ	10538830
IP87	MC7812/CT	46007600
IP95	TDA8139	10044580
IR01	ST92R195 CUT 2.2 FLAT	10588150
IR02	IC-ROM THOMSON V3.20-0	1059455E
IR03	M24C16MN6 FLAT	25348520
IS40	MSP3410D-PP-B3/B4	10510320
IS80	TDA7269	10348790
IV01	TDA8855H FLAT	10533960
IX01	BA7604N	10539590
ZL11	MP25	⚠ 10500150
ZL13	MP63	⚠ 10472270

TB01,**TL**52, **TP**21	BF423	16003110
TB02,**TL**02,55	BF422	16003090
TF01,**TI**60, **TL**31,**TP**58,59, 67,71,76,90, **TR**60,**TS**01,81, **TV**10	BC846B SMD	16006260
TI10,30,45	DTC144EK SMD	16007030
TL14	2SC2236Y	16000220
TL32	BC337-40	45001466
TL33	MPS750	16001340
TL34,**TP**50	BUH516TH16	10401110
TL41	BD241C	16001880
TL42,**TP**14, **TX**15,45	BC546B	45001866
TL51	THYHIPWR	10576770
TL59,**TP**42,86, **TR**15	BC856B SMD	16006310
TL71	BC847C SMD	90618810
TL72	RN1401 SMD	10966100
TP15	BTB06-600C	10259910
TP44	2SA1020Y	16003740
TP57	RN2417 SMD	25423180
TP72,**TR**20	DTC113ZK SMD	10550750
TP75,82	BCR191 SMD	16006910
TP77	RN1409 SMD	20688820
TR13,23,40	BCR141 SMD	16006890
TX80,81,85,86, 88	BC847B SMD	11070770

DB04,**DP**16,17, 18,19	1N4004	44009009
DB05	1.5KE250A	25353360
DB30,31,50,51, 70,71,**DJ**20, **DL**31	BAV21	44044407
DE01	BZX55C2V7	80444120
DH01	BZX55B33	80442730
DH04,**DL**12,32, 33,72,74,75, **DP**53,**DR**20,23, **DV**19	1N4148	44009209
DI30,40	BA782S	20542050
DJ20,**DL**48, **DX**59	BAV103 SMD	10155030
DK01,**DL**09, **DP**72	BZX55B5V1/ZPD5V1 2%	44035702
DL11,24,25,41, **DP**12,41,46,47, 48	RGP10G	10459090
DL13	FUF5402	10458530
DL14	RGP15G	10272800
DL19,73,77, **DP**24,39,40,42, 52,54,56,57, 58,60,61,62, 63,67,70,85, 89,**DR**21,22,24, **DV**09	LL4148 SMD	16012450
DL21	BY228	16008370
DL22	BYW76	16009120
DL42	ZMM5,1 SMD	70446740
DL51	RGP10M	10455320
DL71	BZX55C20	30948810
DP01,02,03,04	BYW27-1000	10455390
DP06	BZW04-342	25354340
DP14	BZX55C3V3	30948790
DP20	ZPD51/BZX55C51/BZX79C51	90578110
DP21	BZX85C39	80444000
DP22	BZX55C6V8	50890650
DP43,45,50,87	RGP02-20	10472330
DP44	BZX55C3V9	80444130
DP59	BZX55C18	11073680
DP80	MUR460	16009650
DP82	FUF4005/MUR160	16009580
DP83	BAT42	16007410
DP84	MUR120	10564670
DP93	MUR420	16009630
DP94	BZX55C13	70438310
DR05	LL42 SMD	16012530
DS90	BZX55C3V6	50890640
DX86	BAS20 SMD	16012250
DX87	BZX84B8V2 SMD	25385640
GE01	TLUV5300 LED	11137650

FI10	OFWK6282K FOS	10648840
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QR01	4M0HZ	10254300
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FI01	40M4HZ	20300950
FI02	31M9HZ	10552630
FI30	77M8HZ	10559760
LL22		10636390

R : RECYCLED PART
: PIECE RECYCLEE
: AUSTAUSCHTEILE
: RICAMBIO RICICLATO
: MODULO REPROCESADO

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Für weitere Auskünfte, wenden Sie sich bitte an die THOMSON multimedia Kundendienste
Per precisazioni, contattare l'assistenza tecnica THOMSON multimedia
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PP64	1K0 OHM		70434550

RB01,04	1K5 OHM 5% 0,50W		10121880
RB06	220R0 OHM 5% 0,25W	⚠	15009810
RB31,51,71	560R0 OHM 10% 0,50W		10257590
RC02	1R0 OHM 5% 0,40W	⚠	13060910
RF05	1R21 OHM 1% 0,70W		13010820
RF07	220R0 OHM 1% 0,70W		10233720
RF08	68R0 OHM 5% 0,70W		15009050
RL01	45K3 OHM 1% 0,25W		15018160
RL07	6K19 OHM 1% 0,40W		15020490
RL13	0R27 OHM 5% 2,50W		10263600
RL35,**RS**87,88	4R7 OHM 5% 0,35W	⚠	10226310
RL36,**RP**10	2R2 OHM 5% 0,25W	⚠	15009870
RL43	68K1 OHM 1% 0,70W		10147740
RL44	1R0 OHM 5% 0,50W	⚠	10576360
RP04	2R7 OHM 5% 4,50W		10379110
RP15	18R0 OHM 220V PTC	⚠	41398800
RP39,52,54,95, **RR**45,**RV**03,14, 30,31	100R0 OHM 5% 0,25W		30943330
RP49	0R47 OHM 5% 2,5W	⚠	25339900
RP50	10M0 OHM 5% 0,70W	⚠	10074320
RP63	432K0 OHM 1% 0,13W		10354720
RS12	18R0 OHM 5% 0,30W	⚠	15009660
RV20	100K0 OHM 1% 0,25W		50883810
RX17	10R0 OHM 5% 0,25W	⚠	15009580

CB01	10N0F 3K0V		14036450
CL08	10N0F 5% 400V		14035870
CL12,15,55, **CP**18,21,42,85, 94	330P0F 20% 1K0V		14035270
CL21	15N0F 3.5% 1K6V		10643660
CL22	27N0F 5% 400V		10263540
CL24	440N0F 5% 250V	⚠	10525280
CL51	290N0F 5% 250V		10378450
CP01	100N0F 20% 275V	⚠	10331520
CP03,04	4N7F 1K0V		10058740
CP05	1N5F 10% 1K0V		20338740
CP10	150U0F 385V		43424800
CP11	10N0F 10% 400V		15001080
CP16,17	470N0F 20% 275V	⚠	10596570
CP20	220P0F 10% 400V		14033000
CP49	3N3F 20% 1K6V		10607950
CP50	1N0F 20% 400V	⚠	43106800
CP51	150P0F 20% 400V	⚠	20738090
CP81	1N0F 10% 500V		10546570
CP83	100P0F 20% 1K0V		14035280

LL05	DSTTDS29	⚠	10608670
LL26		⚠	10526140
LL32	DRIVER		10518110
LP01		⚠	10261530
LP20	DRIVER	⚠	10554410
LP44	DRIVER		10561800
LP50	SMT41	⚠	10537860

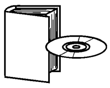
OTHER PARTS
AUTRES PIECES
SONSTIGE TEILE
ALTRE PARTI
OTRAS PIEZAS

BB05	CATHODE RAY TUBE SOCKET SUPPORT TUBE CATHODIQUE BILDROEHRENFASSUNG SUPPORTO TUBO CATODICO SOPORTE T.R.C	⚠	80298800
BJ10	CINCH SOCKET PRISE CINCH CINCH-BUCHSE PRESA CINCH TOMA CINCH		10037440
BJ11	SVHS SOCKET PRISE SVHS S-VHS-BUCHSE PRESA SVHS TOMA SVHS		20392900
BQ12	JACK SOCKET PRISE JACK BUCHSE PRESA JACK TOMA JACK		10539510
BX01,02	SCART SOCKET PRISE PERITEL EURO-AV-BUCHSE EUROPRESA NORMALIZZATA EUROCONECTOR		90617260
CH200	ON/OFF SWITCH CONTACTEUR MARCHE/ARRET EIN-AUS SCHALTER CONTATTORE ACCESO/SPENTO CONTACTOR MARCHA/PARADA	⚠	10276500
FP01	2A5T TIME-LAG FUSE 2A5T FUSIBLE TEMPORISE 2A5T THERMISCHE SICHERUNG 2A5T FUSIBILE TEMPORIZZATO 2A5T FUSIBLE TEMPORIZADO	⚠	10246750
NH01	CTT5010 UHF/VHF TUNER CTT5010 TETE UHF/VHF CTT5010 UHF/VHF TUNER CTT5010 TUNER UHF/VHF CTT5010 SINTONIZADOR UHF/VHF		20812280
SK01,02,03,04	MICROSWITCH MICRO CONTACTEUR MIKROSCHALTER MICROINTERRUTTORE MICROCONTACTOR		30011100

EQUIPMENT/PRESENTATION
EQUIPEMENT/PRESENTATION
AUSSTATTUNG/GEHAEUSE
PARTI VARIE
EQUIPO/PRESENTACION

FRONT PANEL FACADE FRONTPLATTE PANNELLO FRONTALE PANEL FRONTAL		25346170
REAR PANEL DOS RUECKWAND PANNELLO POSTERIORE TAPA POSTERIOR	⚠	25433840
INFRARED WINDOW GLACE INFRAROUGE INFRAROT FENSTER VETRO INFRAROSSO CRISTAL INFRARROJO		25373830
LOGO THOMSON LOGO THOMSON SCHRIFTZUG THOMSON MARCHIO THOMSON LOGOTIPO THOMSON		25367520
CHASSIS SUPPORT SUPPORT CHASSIS CHASSIS HALTER SUPPORTO CHASSIS SOPORTE CHASSIS		25296750
COVER JACK SOCKET CACHE PRISE JACK ABDECKUNG BUCHSE COPERCHIO PRESA JACK CUBIERTA TOMA JACK		25298150
8R OHM 15W LOUDSPEAKER 60X125 8R OHM 15W HAUT PARLEUR 60X125 8R OHM 15W LAUTSPRECHER 60X125 8R OHM 15W ALTOPARLANTE 60X125 8R OHM 15W ALTAVOZ 60X125		10467060
ON/OFF BUTTON TOUCHE MARCHE/ARRET EIN-AUS TASTE TASTO ACCESO/SPENTO TECLA MARCHA/PARADA		25309090
BUTTON ASSY ENSEMBLE DE TOUCHES TASTENEINHEIT ASSIEME TASTI CONJUNTO DE TECLAS		25312630
POWER SUPPLY LEAD CORDON D'ALIMENTATION NETZKABEL CAVO DI ALIMENTAZIONE CABLE DE ALIMENTACION	⚠	10260880
W66EJU023X015 CATHODE RAY TUBE W66EJU023X015 TUBE CATHODIQUE W66EJU023X015 FARBBILDROEHRE W66EJU023X015 TUBO CATODICO W66EJU023X015 T.R.C	⚠	10647170
DEGAUSSING COIL BOBINE DE DEMAGNETISATION ENTMAGNETISIERUNGSSPULE BOBINA DI SMAGNETIZZAZIONE BOBINA DE DESIMANTACION	⚠	47320181
RCTMB100 REMOTE CONTROL RCTMB100 TELECOMMANDE RCTMB100 FERNBEDIENUNG RCTMB100 TELECOMANDO RCTMB100 TELEMANDO		20879230
FOLDING BOX EMBALLAGE CARTON KARTON IMBALLAGGIO CARTONE EMBALAJE CARTON		25443870

FITTING DOWNER CALE INFERIEURE POLSTER UNTEN DISTANZIATORE INFERIORE CALZO INFERIOR	25348810
FITTING UPPER CALE SUPERIEURE POLSTER OBEN DISTANZIATORE SUPERIORE CALZO SUPERIOR	25348820



28WN22E PARTS LIST 28WN22E LISTE DE PIECES DETACHEES 28WN22E ERSATZTEILLISTE 28WN22E LISTA PARTI DI RICAMBIO 28WN22E LISTA DE PIEZAS DE REPUESTO	35105110
ICC17 SERVICE MANUAL EUROPE ICC17 DOC TECHNIQUE EUROPE ICC17 TECHNISCHE DOKUMENTATION EUROPE ICC17 DOCUMENTAZIONE TECNICA EUROPE ICC17 DOCUMENTACION TECNICA EUROPE	35063330
28WN22E UM TH D/F/I/E/GB/NL/S/DK/PL/GR 28WN22E NU TH D/F/I/E/GB/NL/S/DK/PL/GR 28WN22E BA TH D/F/I/E/GB/NL/S/DK/PL/GR 28WN22E IU TH D/F/I/E/GB/NL/S/DK/PL/GR 28WN22E IU TH D/F/I/E/GB/NL/S/DK/PL/GR	25390150
ICC17 UPDATING N°01 ICC17 MISE A JOUR N°01 ICC17 ERGAENZUNG N°01 ICC17 AGGIORNAMENTO N°01 ICC17 ACTUALIZACION N°01	35080950
CDROM ICC17 CDROM ICC17 CDROM ICC17 CDROM ICC17 CDROM ICC17	35065140

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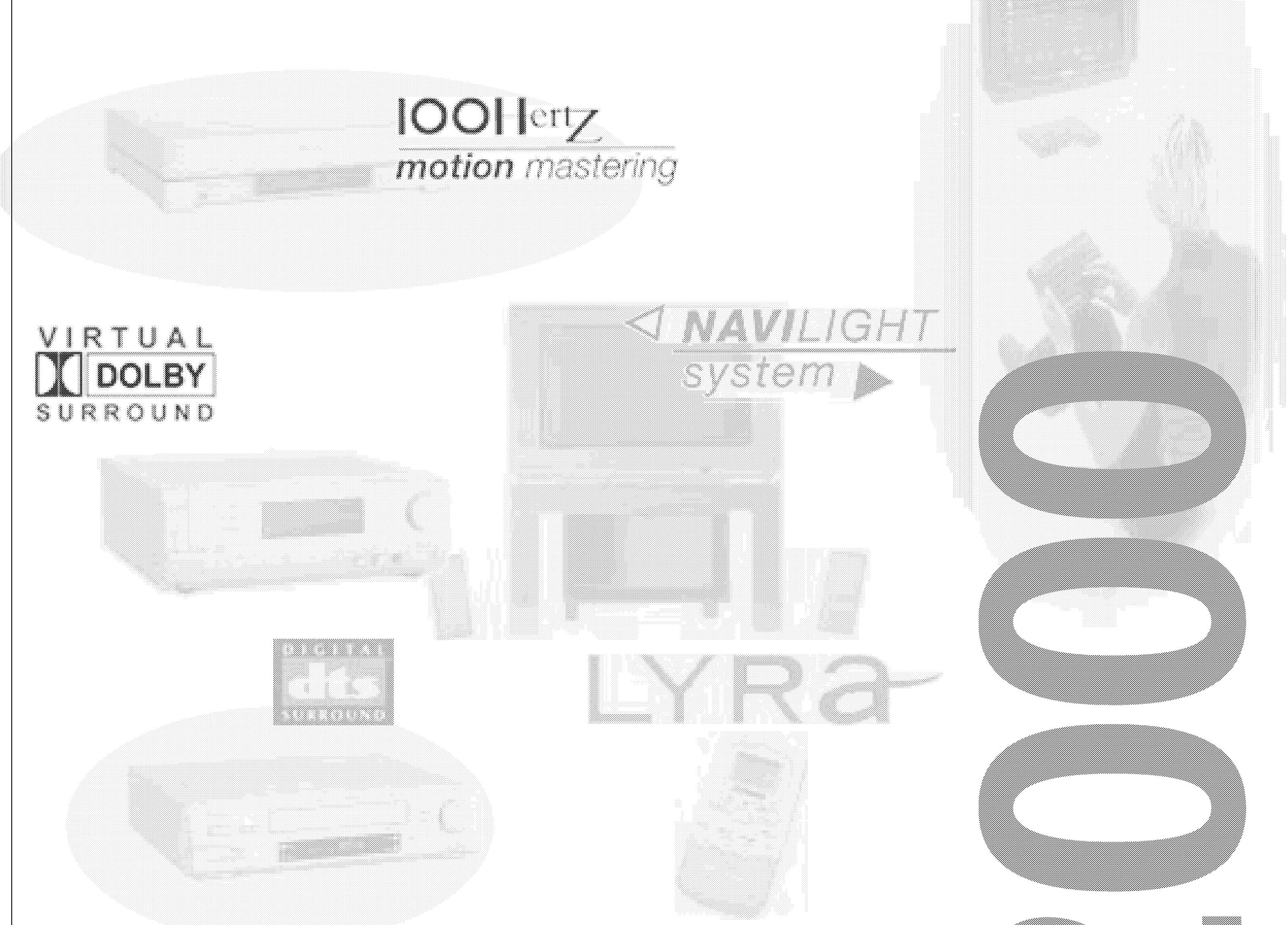
LES PROGRAMMES

- LA FORMATION PARATECHNIQUE
- LES PRODUITS HIGH TECH
- FORMATION VENDEURS
- MICRO INFORMATIQUE
- JOURNÉES FORMATION SERVICE
- MAINTENANCE 1er DEGRÉ D'INTERVENTION
- LES STAGES TECHNIQUES
  - Techniques vidéo
  - Techniques Télévision

- NOS COORDONNÉES
- RÉSUMÉS DE COURS
- CASSETTES D'AIDE À LA MAINTENANCE
- BULLETIN D'INSCRIPTION
- ACCÈS À NOS LOCAUX
- HOTELS

QUITTER

THOMSON MULTI MEDIA

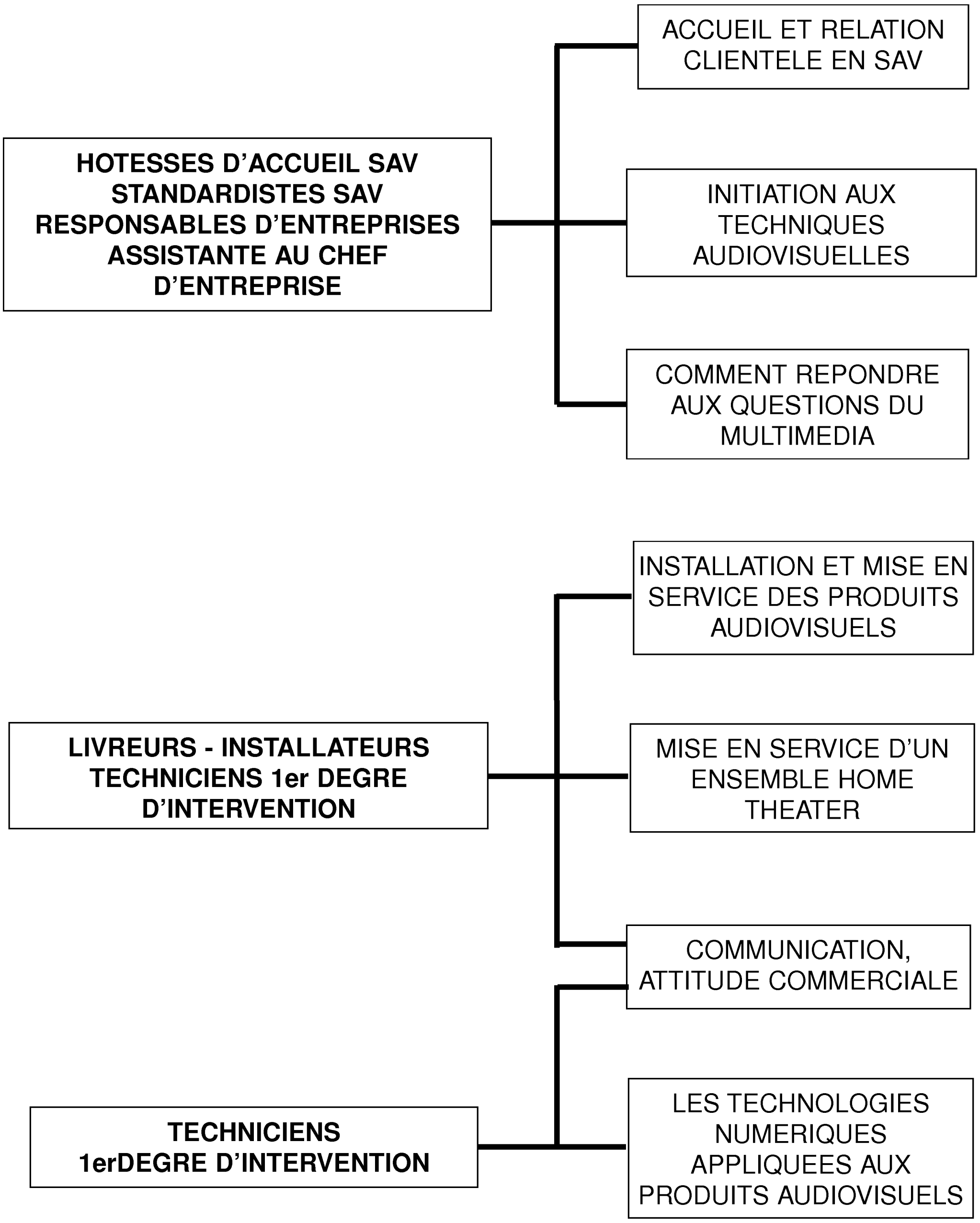

100Hertz
motion mastering
VIRTUAL DOLBY SURROUND
NAVILIGHT system
DIGITAL dts SURROUND
LYRa

CENTRE DE FORMATION

THOMSON multimedia

2000

LA CHAÎNE *du* SERVICE


HOTESSES D'ACCUEIL SAV
STANDARDISTES SAV
RESPONSABLES D'ENTREPRISES
ASSISTANTE AU CHEF D'ENTREPRISE
ACCUEIL ET RELATION CLIENTELE EN SAV
INITIATION AUX TECHNIQUES AUDIOVISUELLES
COMMENT REPONDRE AUX QUESTIONS DU MULTIMEDIA
LIVREURS - INSTALLATEURS
TECHNICIENS 1er DEGRE D'INTERVENTION
INSTALLATION ET MISE EN SERVICE DES PRODUITS AUDIOVISUELS
MISE EN SERVICE D'UN ENSEMBLE HOME THEATER
COMMUNICATION, ATTITUDE COMMERCIALE
TECHNICIENS
1erDEGRE D'INTERVENTION
LES TECHNOLOGIES NUMERIQUES APPLIQUEES AUX PRODUITS AUDIOVISUELS

LES PRODUITS HIGH TECH

RESPONSABLES D'ENTREPRISES
DIRECTEURS SAV
TECHNICIENS 1er DEGRE D'INTERVENTION
TECHNICIENS D'ATELIER

- LA TECHNOLOGIE DES ECRANS PLASMA
- LA TECHNOLOGIE DES LECTEURS DE DISQUES NUMERIQUES DVD
- LES LECTEURS AUDIO FORMAT MP3
- LES CAMESCOPES NUMERIQUES DVCR
- LE HOME THEATER
- LES TECHNOLOGIES EGP A L'ERE DE L'INTERACTIVITE

LES FORMATIONS VENDEURS

- **VENDEURS**
  TECHNICO-COMMERCIAUX
  RESPONSABLES D'ENTREPRISES
  ASSISTANT(E) AU CHEF D'ENTREPRISE
  - CONNAÎTRE LES PRODUITS AUDIOVISUELS POUR MIEUX LES VENDRE *MODULE I*
  - CONNAÎTRE LES PRODUITS AUDIOVISUELS POUR MIEUX LES VENDRE MODULE II
  - CONNAÎTRE LA PHOTO NUMÉRIQUE POUR MIEUX LA VENDRE
  - CONNAÎTRE LES PRODUITS INFORMATIQUES POUR MIEUX LES VENDRE

SOMMAIRE

MICRO INFORMATIQUE

MAINTENANCE

- CONFIGURATION ET MAINTENANCE DES PC
  - INSTALLATION DE PÉRIPHÉRIQUES MULTIMEDIA ET RÉSEAUX

SYSTEME D'EXPLOITATION

- WINDOWS 98 AVANCÉ - LINUX

INTERNET

- INITIATION A INTERNET - CRÉATION DE SITE WEB

SOMMAIRE

ASSISTANCE A LA MAINTENANCE, CHÂSSIS VIDEO R4000 / R5000

ASSISTANCE A LA MAINTENANCE, CHÂSSIS TV ICC9

ASSISTANCE A LA MAINTENANCE, CHÂSSIS TV TX91-91G / TX92-92F

SOMMAIRE

MAINTENANCE
1er degré D'INTERVENTION

MAINTENANCE
1er DEGRE D'INTERVENTION,
CHÂSSIS TV ICC10/11

MAINTENANCE
1er DEGRE D'INTERVENTION,
CHÂSSIS TV ICC17

MAINTENANCE
1er DEGRE D'INTERVENTION,
CHÂSSIS TV ICC19

MAINTENANCE
1er DEGRE D'INTERVENTION,
CHÂSSIS TV ICC20

SOMMAIRE

LES TECHNIQUES VIDÉO

LECTEURS DVD

- PRINCIPE ET MAINTENANCE DES LECTEURS DVD DTH 1000/2000/2500
- PRINCIPE ET MAINTENANCE DES LECTEURS DVD DTH 3300/3600/3700

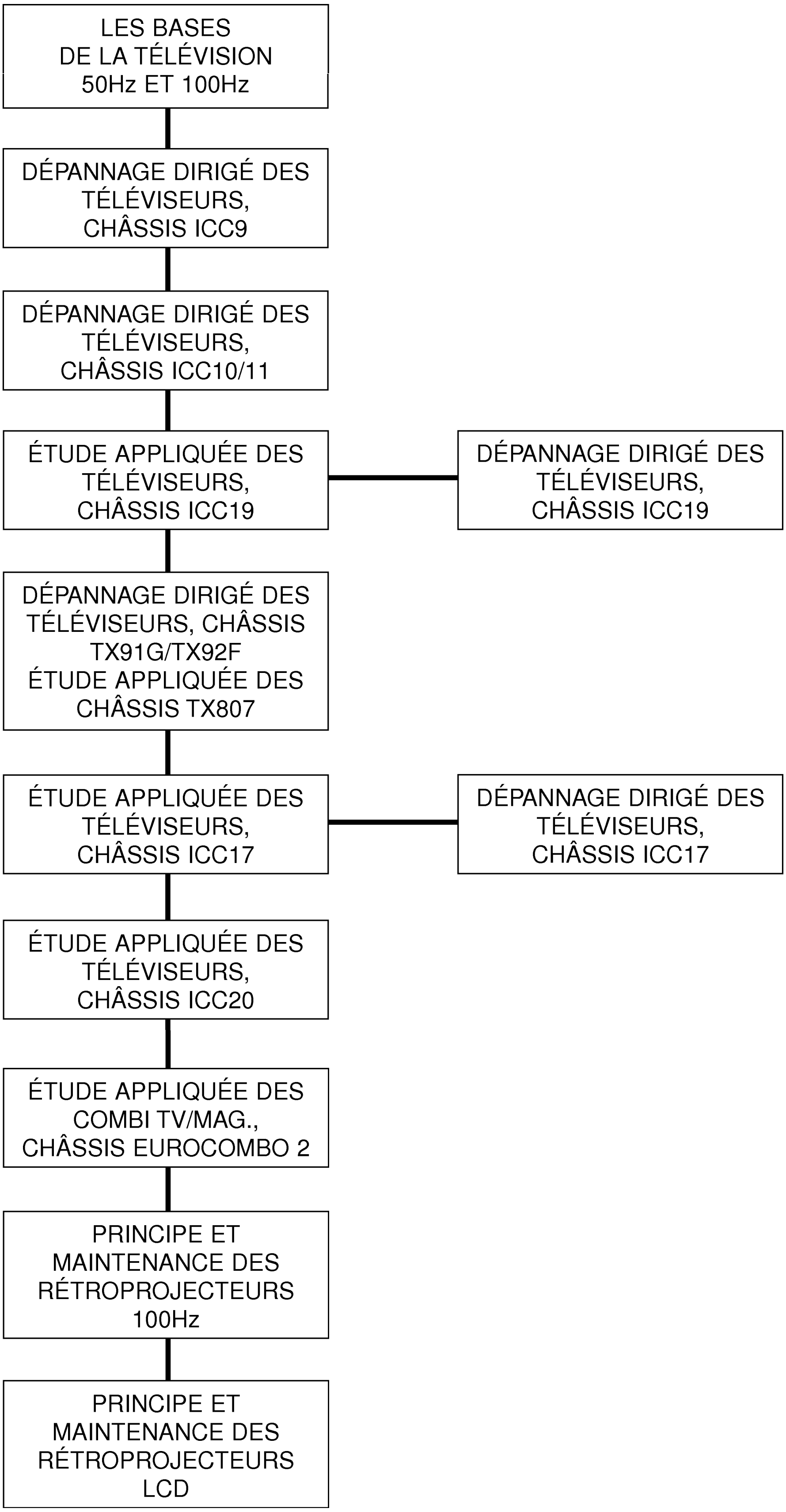
MAGNÉTOSCOPES

- PRINCIPE ET MAINTENANCE DES MAGNÉTOSCOPES VHS
- ETUDE APPLIQUÉE DES MAGNÉTOSCOPES, CHÂSSIS R6000 ET R7000
- ETUDE APPLIQUÉE DES MAGNÉTOSCOPES, CHÂSSIS R8000
- ETUDE APPLIQUÉE DES MAGNÉTOSCOPES, CHÂSSIS R9000
- EVOLUTION DES CHÂSSIS R7000 DÉPANNAGE DIRIGÉ DES CHÂSSIS R6000/R7000

CAMESCOPES

- LES BASES DES CAMESCOPES FORMAT VHS-C ET VIDÉO 8
- LA MAINTENANCE DES CAMESCOPES VHS-C, CHÂSSIS M10, M11 ET M12
- LA MAINTENANCE DES CAMESCOPES DV, CHÂSSIS VMD2, VMD3 ET VMD8

LES TECHNIQUES TÉLÉVISION



LES BASES DE LA TÉLÉVISION 50Hz ET 100Hz

DÉPANNAGE DIRIGÉ DES TÉLÉVISEURS, CHÂSSIS ICC9

DÉPANNAGE DIRIGÉ DES TÉLÉVISEURS, CHÂSSIS ICC10/11

ÉTUDE APPLIQUÉE DES TÉLÉVISEURS, CHÂSSIS ICC19

DÉPANNAGE DIRIGÉ DES TÉLÉVISEURS, CHÂSSIS ICC19

DÉPANNAGE DIRIGÉ DES TÉLÉVISEURS, CHÂSSIS TX91G/TX92F
ÉTUDE APPLIQUÉE DES CHÂSSIS TX807

ÉTUDE APPLIQUÉE DES TÉLÉVISEURS, CHÂSSIS ICC17

DÉPANNAGE DIRIGÉ DES TÉLÉVISEURS, CHÂSSIS ICC17

ÉTUDE APPLIQUÉE DES TÉLÉVISEURS, CHÂSSIS ICC20

ÉTUDE APPLIQUÉE DES COMBI TV/MAG., CHÂSSIS EUROCOMBO 2

PRINCIPE ET MAINTENANCE DES RÉTROPROJECTEURS 100Hz

PRINCIPE ET MAINTENANCE DES RÉTROPROJECTEURS LCD